

COMPANIES AND ORGANIZATIONS

CO1 – Stop the Pipeline

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CO
1-1

FERC says no environmental impacts. What about these?



Project description:

- 124.4 miles long
- 18 miles of access roads
- 1,862 acres of land would be torn apart during construction

CO1-3

Impacts:

- Hundreds of thousands of mature trees would be cut
- Forest fragmentation
- Soil compaction
- Restricts crops that could be grown
- Noise, structural damage, and aquifer contamination from blasting and jack hammers
- Water quality degradation
- Creates a pathway for storm runoff

CO1-4

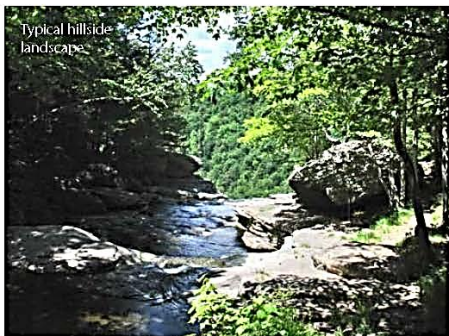
CO
1-2

Almost all of the proposed pipeline route would cross sensitive or difficult terrain:

- 36 miles of interior forest - 29% of entire route
- 277 bodies of water
- 35.1 miles of steep & side slopes - 28% of entire route
- 45.43 miles of shallow bedrock - 37% of entire route
- 10.7 miles of wetlands - 9% of entire route (This will be higher as 25% of parcels have not been surveyed.)
- 555.34 acres of prime and "statewide important" farmland
- 33.35 miles in agricultural districts - 27% of entire route

"There is a 100 year flood every 2 years now."
—Gov. Andrew Cuomo, State of the State, 1/9/13

CO
1-5



For more information please visit www.StopThePipeline.org

CO1-1

The EIS does not state that there would be no environmental impacts associated with the proposed projects. Section 5.1 indicated that adverse impacts would occur during both construction and operation of the projects, but that these impacts would be reduced to less than significant levels given applicable laws and regulations, the mitigating measures discussed in the EIS, and our recommendations.

CO1-2

Sensitive resources, as well as potential impacts and mitigation, are discussed in the EIS for interior forest (section 4.5.3), waterbodies (section 4.3.3), steep slopes (sections 2.3.2, and 4.1.3; appendix G), shallow bedrock (sections 2.3.1 and 4.1.3; appendix I), wetlands (section 4.4 and appendix L), wildlife (section 4.6.2.3), air quality (section 4.11.1), and farmland/agriculture (sections 2.3.2, 4.2, 4.8.4 and appendix J).

CO1-3

The commentator's statements regarding the length of the proposed pipeline project, the length of proposed access roads, and the amount of land that would be disturbed during construction are noted.

CO1-4

The cutting of mature trees and forest fragmentation would occur as a result of the proposed pipeline project as discussed in section 4.5. These impacts would be minimized or mitigated by the reduction of the construction right-of-way in interior forest areas, regrowth of trees in approximately 54 percent of the previously forested areas cleared during construction, and implementation of an upland forest mitigation plan as we have recommended. Constitution would employ measures to decompact soils where necessary as described in section 4.2.4. Constitution would conduct compaction tests and till compacted subsurface soils in agricultural and residential areas through the use of a paratill or similar equipment as identified in the ECPs. Row crops could still be grown in agricultural areas following installation of the pipeline as described in section 4.8.1, but trees would not be allowed to re-establish within the 50-foot-wide permanent right-of-way in upland areas. We also recommended in the EIS that Constitution should prepare an impact avoidance, minimization, or mitigation plan for specialty crops developed in coordination with the landowner if possible (section 4.8.4). Blasting (sections 2.3.1 and 4.1.3) and construction impacts upon noise receptors (section 4.11.2), homes and structures (sections 2.3.1 and 4.1.3), and groundwater (section 4.3.1) are discussed in the EIS.

COMPANIES AND ORGANIZATIONS

CO1 – Stop the Pipeline (cont’d)

- CO1-4
(cont’d)

Given Constitution’s proposed mitigation measures and our recommendations, we conclude that impacts from blasting would be effectively minimized. Constitution and Iroquois would both implement sediment and erosion controls based upon our Upland Erosion Control, Revegetation, and Maintenance Plan (Plan) and the Wetland and Waterbody Construction and Mitigation Procedures (Procedures), which were revised in 2013, as well as other proposed measures to prevent water quality degradation and negative effects of stormwater runoff. These measures are described in sections 2.3 and 4.3 of the EIS and in Constitution’s Plan. Constitution’s Plan requires the inspection and maintenance of temporary erosion control measures at least on a daily basis in areas of active construction or equipment operation, on a weekly basis in areas with no construction or equipment operation, and within 24 hours of each 0.5-inch rainfall event.
- CO1-5

The potential for flooding, and related impacts resulting from the projects and also upon the pipeline itself following construction, are discussed in sections 4.1.3 and 4.3.3.

COMPANIES AND ORGANIZATIONS

CO2 – Stop the Pipeline

If built, the proposed pipeline should be co-located with existing pipeline, utility, highway, or railroad easements

FERC (Federal Energy Regulatory Commission)

CO
2-1

• According to FERC, new gas transmission lines should be sited to "avoid forested areas and steep slopes...." 18 C.F.R. § 380.15(d)(3).

CO
2-2

• "The use, widening, or extension of existing rights-of-way must be considered in locating proposed facilities." 18 C.F.R. § 380.15(d)(1).

NYS DEC (New York State Department of Environmental Conservation)

CO
2-3

• "NYSDEC requests that Constitution thoroughly analyze alternative routes that predominantly use existing utility corridors and rights-of-way (ROW) (including road and railroad ROW) for all or most of the proposed pipeline route in New York."

Patricia J. Denoyers, NYS Department of Environmental Conservation, 9/25/13 letter to FERC.

CO
2-4

• Co-location would "avoid the catastrophic erosion events witnessed by NYSDEC staff in previous pipeline installations..." *DEC's 11/07/12 letter to FERC.*



Typical I-88 highway corridor

USACE (United States Army Corps of Engineers)

CO
2-5

• "Additional details and documentation to support the reasons why the pipeline could not be constructed within the New York State Department of Transportation's (NYSDOT) "control access" area. It does not appear that this option was fully explored and the applicant provided no documentation or correspondence from the NYSDOT to support any determination or conclusions they may have made."

Kevin Bruce, United States Army Corps of Engineers, 7/24/13 letter to FERC.

"Constitution" Pipeline Company

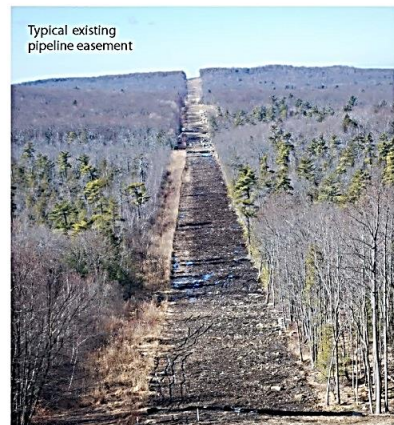
CO
2-6

• Has not done what they have been instructed to do by federal and state authorities.
• Only 9% of the proposed route would be co-located.

CO
2-7

• "Routes that change course from existing rights-of-way will have more environmental opposition." *Canada's U.S. Ambassador, Pipeline & Gas Journal, December 2013, Vol. 240 No. 12.*

For more information please visit www.StopThePipeline.org



Typical existing pipeline easement

CO2-1

Section 380.15(b) of the Commission's siting guidelines is misinterpreted by the commentor. This section of the Commission's regulations is intended to guide applicants in their preliminary selection of project routes. The section provides numerous criteria by which the Commission typically evaluates proposals and uses the criteria to weight the impacts of one over the other. By no means do these siting guidelines indicate that existing rights-of-ways are the only locations at which a project could be built. Through the Commission's review process, we often discover that many routes are infeasible even though they meet one or more of the suggested criteria for designing a pipeline route. In fact, the FERC staff directed Constitution to evaluate collocated options for its pipeline early in the review of this project. (See June 11, 2012 comments on draft resource reports).

We have evaluated numerous route alternatives to Constitution's proposed route in order to assess whether impacts could be further minimized, including impacts on forested lands and on steep slopes. We note that Constitution has adopted numerous route alternatives into its proposed route over the course of the project, and we concluded that several other alternative routes were not environmentally preferable to the proposed route.

CO2-2

See the response to comment LA7-4.

CO2-3

See the responses to comments CO2-2, FA4-18, and FA4-20.

CO2-4

Constitution and Iroquois would both implement sediment and erosion controls based upon our Upland Erosion Control, Revegetation, and Maintenance Plan and the Wetland and Waterbody Construction and Mitigation Procedures, as well as other proposed measures to prevent water quality degradation and negative effects of stormwater runoff. These measures are described in sections 2.3 and 4.3 of the EIS.

COMPANIES AND ORGANIZATIONS

CO2 – Stop the Pipeline (cont’d)

- CO2-5 Alternative M, which involves collocation with Interstate 88 (I-88), was evaluated and discussed in detail in section 3.4.1.2 of the EIS. Use of the median and the controlled access area of I-88 for construction of a pipeline is constrained by the amount of workspace available, side slopes present, amount of ingress and egress during construction, and impacts on traffic flow and roadway operation. We conclude that placement of the pipeline within the median of I-88 or adjacent to the roadway is not feasible.
- CO2-6 Alternative routes, including those with increased collocation with existing rights-of-way, have been assessed within the EIS.
- CO2-7 The commentor’s statement regarding environmental opposition to non-collocated routes is noted.

COMPANIES AND ORGANIZATIONS

CO3 – Stop the Pipeline

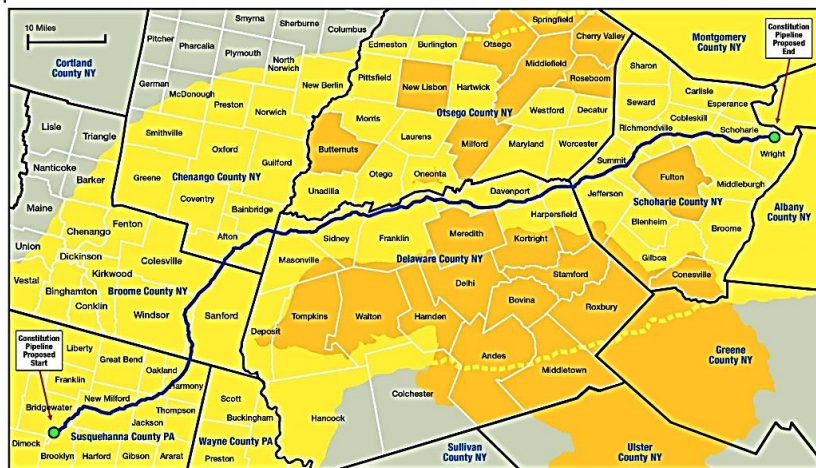
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Even the DEC says Pipelines = Fracking

CO3-1 NYS DEC (New York State Department of Environmental Conservation)

"[T]he Applicant must evaluate whether the Project would be reasonably available for supply and distribution for communities along the Project route and whether the Project could reasonably serve as a collector line for additional supply from New York Marcellus and Utica Shale formations. Since the location of the proposed Project route has a high potential for development of natural gas extraction from Marcellus and Utica Shale formations, as indicated in the revised NYSDEC draft Supplemental Generic Environmental Impact Statement on the Oil, Gas and Solution Mining Regulatory Program, September 7, 2011, the draft EIS must evaluate the cumulative environmental impacts associated with these potential activities." *Patricia J. Denoyers, NYS DEC, 7/17/13 motion to intervene.*

CO3-2 In the map below:
Yellow indicates the 40-mile wide study area for fracking.
Orange indicates towns and watersheds where fracking is banned.
The pipeline would extend about 100 miles through Central NYS.



CO3-3 Everyone should submit comments on all of the "reasonably foreseeable" cumulative impacts caused by fracking and industrial development. Assume that gas drilling would take place in the yellow study area according to the rules in the NYS DEC's Draft SGEIS:

- There could be 16 wells per square mile - per formation. Since there are two formations in the yellow study area (Utica and Marcellus), there could be 32 wells per square mile;
- The average size of each well pad is 3.5 acres, plus access roads and gathering lines;
- It would take 6,700 truck trips to construct ONE pad and frack ONE well.
- Where would the drill cuttings and waste water go?

In Pennsylvania, producing gas wells are as much as 25 miles from a high pressure gas transmission line.

- A pipe must be laid from each well to a transmission line.
- Compressor stations are located every 2-4 miles along major gathering lines.

For more information please visit www.StopThePipeline.org

CO3-1

The EIS addresses the question about whether the projects could provide natural gas for distribution to communities along the pipeline (section 1.1). The potential for the proposed pipeline to serve as a collector line for future, additional gas supply, would be modest. We noted that with an increase in pressure of 1,400 pounds per square inch gauge (psig), the Constitution pipeline's maximum capacity would be 850,000 Dth/d, which is 200,000 Dth/d (31 percent) greater than the currently proposed level. This relatively modest allowance for increased capacity would likely preclude the use of the Constitution line as a major conduit for newly emerging, local gas supplies, should they develop. As discussed in section 4.13.1 of the EIS, the general development of the Marcellus Shale in proximity to the projects within the context of cumulative impacts was considered.

CO3-2

High volume hydraulic fracturing is currently prohibited within the entire state of New York, not just within the towns highlighted in orange on the map.

CO3-3

See response to CO3-1.

COMPANIES AND ORGANIZATIONS

CO4 – Elephant for Kernan Land Trust

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(202) 297-6100 • carolyn@carolynelefant.com

The Honorable Secretary Kimberly Bose
Federal Energy Regulatory Commission
888 First Street N.E.
Washington D.C. 20426
March 10, 2014

**Re: Request for Extension of Time for Meaningful Comment on
Deficient Draft Environmental Impact Statement (EIS)**

Constitution Pipeline Docket No. CP13-499

Dear Secretary Bose,

CO4-1 I represent the Henry S. Kernan Land Trust (Trust) in the above-captioned proceeding. The Trust has reviewed the Draft EIS issued on February 12, 2014 and discovered that the document leaves several areas – such as the rationale for rejecting the Trust’s preferred alternative – incomplete, while it does not provide reference sources for many of the conclusions as required by the Council on Environmental Quality (CEQ) regulations. Given these information gaps, meaningful public participation and comment is impossible. In this letter, we ask the Commission to address these deficiencies and re-start the comment period after these issues have been addressed. This letter highlights the most significant omissions in the DEIS and discusses the applicable standards for a legally compliant environmental analysis.

I. Applicable Regulations and Caselaw

The purpose of the National Environmental Policy Act (NEPA) and the accompanying CEQ regulations is to provide sufficient information to “foster both informed decision making and informed public participation. *Northwest Resource Info. Ctr., Inc. v. National Marine Fisheries Serv.*, 56 F.3d 1060, 1064 (9th Cir.1995)(finding EIS inadequate). Moreover, not only must a EIS thoroughly discuss both the action and proposed alternatives, but is must also describe proposed mitigation “in sufficient detail to ensure that environmental consequences have been fairly evaluated.” *Carmel-By-the-Sea v. U.S. Dep’t of Transp.*, 123 F.3d 1142, 1154 (9th Cir.1997). “A mere listing of mitigation measures is insufficient to qualify as the reasoned discussion required by

CO4-1

See the response to comment FA1-1. References were provided in appendix Q of the draft EIS. The FERC staff reviewed the information provided for the Henry S. Kernan Land Trust (Trust) as discussed in section 4.8.4. Desktop data sources were used because Constitution did not have access to the parcel, and no other party with access had provided a wetland delineation prior to issuance of the draft EIS. The FERC did not reject the Trust’s preferred alternative, rather we recommended in section 3.4.3.2 that Constitution further assess minor route variations in consultation with the Trust (parcel NY-DE-226.000) and either adopt a route that avoids the resources of concern or otherwise explain how potential impacts on resources have been effectively avoided, minimized, or mitigated. Subsequently, we issued an environmental information request to Constitution requiring further assessment of specific minor route variations near the Trust’s property. Our assessment of this new information is provided in section 3.4.3 of the EIS.

COMPANIES AND ORGANIZATIONS

CO4 – Elephant for Kernan Land Trust (cont'd)

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CO4-1
cont. NEPA.” *Northwest Indian Cemetery Protective Ass’n. v. Peterson*, 795 F.2d 688, 697 (9th Cir.1986). See also 40 C.F.R. §1502.14 (f)(providing that EIS must “include appropriate mitigation measures not already included in the proposed action or alternatives.”)

To further facilitate public participation and insure the “professional integrity of the environmental analysis,” the CEQ regulations require an agency to “make explicit reference by footnote” to the scientific and other sources relied upon for the conclusions in the statement.” 40 C.F.R. §1502.24. This requirement enables members of the public to probe the assertions in the EIS.

The requirements for an adequate EIS apply equally, if not more so to the DEIS. After all, the DEIS serves as the document on which the public will comment, so lack of adequate detail thwarts the type of meaningful public participation contemplated by NEPA.

Finally, the CEQ regulations clarify that a DEIS must “fulfill and satisfy to the fullest extent possible the requirements established for final statements in section 102(2)(C) of [NEPA].” 40 C.F.R. § 1502.9. The consequences for inadequacy are real: **if a draft statement is so inadequate as to preclude meaningful analysis, the agency shall prepare and circulate a revised draft of the appropriate portion.** *Id.* (emphasis added).

CO4-2

II. Deficiencies in the DEIS for the Constitution Pipeline

The DEIS for the Constitution Pipeline falls short of NEPA requirements, and indeed is so deficient that it does not allow for meaningful public participation. The DEIS makes only passing reference to impacts to the Kernan Trust lands which it states was raised in “landowner letters,” and omits mention of the extensive professional reports and expert opinions submitted to document these impacts. See DEIS 4-125. If the scope and extent of the impacts to the Trust lands discussed in the Trust’s expert reports were fully disclosed in the DEIS as required by NEPA, they would likely raise serious concerns for members of the public and resource agencies. Yet, the DEIS is so vague that it prevents the public from learning the true extent of the pipeline’s impacts.

The DEIS also contains substantial gaps in its discussion of alternatives and proposed mitigation. The Trust endorsed two alternative strategies – collocation with I-88, and several minor route deviations around the property. Using only a table to provide any response, the DEIS summarily rejected the Trust’s minor route deviations in cursory and cryptic fashion, claiming that there were unidentified “issues” with the

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CO4-2

The studies and expert opinions prepared for the Kernan Trust lands are available for review by the public on e-Library. As noted above, the FERC staff reviewed the information provided for the Trust as discussed in section 4.8.4 of the EIS and recommended that Constitution further assess minor route alternatives in coordination with the Trust. As noted before, the EIS is a summary of the information in the record and is not intended to be encyclopedic. Our analysis considered the studies and opinions of the Trust’s scientific experts. Because these studies were not included as appendices to the EIS does not mean staff did not deliberate on their significance.

The intent of this ongoing coordination was to allow the Trust the opportunity to continue to provide input into the review process during Constitution’s assessment, and presumably the Trust would have known the results of mutual discussions prior to the close of the comment period for the draft EIS. Based on other comments subsequently received from the Trust and its agents, it appears such coordination was limited or did not occur. See the response to comment CO4-1 regarding an environmental information request filed with constitution after the close of the draft EIS comment period. We have updated section 3.4.3 of the EIS with the new information and with our conclusion regarding route and construction alternatives and potential impacts upon the Trust property.

COMPANIES AND ORGANIZATIONS

CO4 – Elephant for Kernan Land Trust (cont'd)

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CO4-2
cont.

propane pipeline which precluded use of the right-of-way for the Constitution line, and providing other dismissive reasons with no correlation to which proposed deviation was being dismissed. Unfortunately, the DEIS neither describes the "issues" nor provides the source of this information. Without these key details, the public cannot refute the DEIS' decision to reject these alternatives.

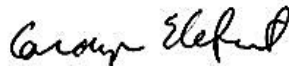
In part, the Commission acknowledged the deficiencies with DEIS, because it asked Constitution to "further assess minor route deviations for the tracts identified in table 3.4.3-1" and "either incorporate a route that avoids the resources of concern or otherwise explain how potential impacts on resources have been effectively avoided, minimized, or mitigated." DEIS at 5-4. But the Commission also allowed Constitution to submit this updated assessment of route alternatives by the end of the comment period – which effectively forecloses the public from ever commenting on the proposal.

III. An Extension is Warranted

CO4-3

In accordance with the provisions of 40 C.F.R. § 1502.9, the inadequacies just described warrant a full rescission of the DEIS. We believe therefore that review of the DEIS should be suspended indefinitely until missing information can be obtained, references provided, and the document otherwise brought into full compliance with applicable regulations. We believe that once the DEIS is found to be complete and understandable so to provide for adequate, meaningful public review, should it be reissued in its revised form and only then should the 45-day public comment period commence. In the alternative, we ask that the Commission issues a supplemental DEIS to cure the listed deficiencies and re-start the comment period at that time. In this way, the Commission will ensure that both the DEIS and Final EIS satisfy the requirements of NEPA.

Respectfully submitted,



Carolyn Elephant

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CO4-3

See the response to comment FA1-1.

COMPANIES AND ORGANIZATIONS

CO5 – Kernan Land Trust

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The Henry S. Kernan Land Trust & The Charlotte Forest PO 317 / County Highway 40 / Worcester NY / 12197
Trustees: H. Devereux Kernan / Catherine S. Kernan / Bruce D. S. Kernan / Christopher N. Kernan / Patricia McC. Kernan

SENT VIA ELECTRONIC FILING

Reference: Comments on Draft Environmental Impact Statement in support of a request for extension of time to comment

OEP/DG2E/Gas 4
Constitution Pipeline Company, LLC
Constitution Pipeline Project
Iroquois Gas Transmission System, L.P.
Wright Interconnect Project
Docket Nos. CP13-499-000
CP13-502-000

Ms. Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
Washington DC 20426
Re: Docket No. CP13-499-000
Constitution Pipeline

cc. US Army Corps of Engineers
The FERC New York District, CENAN-OP-R
888 First Street NE, Room 1A Upstate Regulatory Field Office
Washington, D.C. 20426 1 Buffington Street, Bldg. 10, 3rd Floor

Dear Ms. Bose:

I submit the following comments on the Draft Environmental Impact Statement for the proposed pipeline in support of a request that FERC extend the time to file comments.

- CO5-1 | The DEIS lacks information and data that are essential to meaningful comments. FERC itself requests further information about the following from Constitution:
- (1) a slope stability analyses;
 - (2) geotechnical feasibility studies;
 - (3) additional well locations;
 - (4) analysis of indirect impacts to waterbodies;
 - (5) site-specific plans for the permanent access road crossings in wetlands;

CO5-1 See the response to comment FA1-1.

COMPANIES AND ORGANIZATIONS

CO5 – Kernan Land Trust (cont'd)

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- CO5-1 cont. (6) an upland forest mitigation plan;
(7) completion of bald eagle studies;
(8) site-specific blasting plans;
(9) written approval from the NYSDEC allowing water withdrawals;
(10) mitigation for special-status bat species;
(11) remaining surveys for state-listed species;
(12) classification of currently unsurveyed structures;
(13) site-specific noise mitigation plans;
(14) and additional information and analysis on 13 minor route alternatives.
- By asking for this additional information, the FERC itself indicates that it is required for the DEIS to be considered adequate. It should not ask the public to comment on an inadequate DEIS.
- CO5-2 The DEIS requires Constitution to provide additional information by the same date that the comment period ends. It will therefore be impossible for the public to comment on this additional information. Specifically, the DEIS requires Constitution to provide additional analysis on how it intends to avoid or minimize negative effects on Kernan Trust Land. Kernan Trust will be unable to comment on these additional analyses if comment period ends concurrently with the provision of these data.
- CO5-3 The Kernan Land Trust provided essential biological and ecological data on the wetlands on its property. The DEIS makes no reference to this data. It is not possible for the Kernan Trust to comment properly on the DEIS until it includes the data which the Kernan Land Trust has provided. To not give the Kernan Land Trust opportunity to comment properly on the DEIS for a project that would affect its wetlands and forests negatively, significantly and irreversibly would be a grave injustice.
- CO5-4 On page 1-3 the DEIS states that Constitution has field surveyed approximately 534 of 707 land tracts or about 76 percent of the total number of tracts. On page 1-4 the DEIS states that "...a substantial number of the outstanding surveys for Constitution's project... would have to be completed after issuance of the Certificate". Twenty-four percent of the field survey information required for an adequate, acceptable EIS is not yet available. So FERC is requesting public comment on a document that is 24 % incomplete, although it is not possible to predict the significance of the data that have not yet been collected, analyzed and evaluated.
- CO5-5 The analyses in the DEIS use data selectively and inaccurately. As one example, consider the following paragraph on page 3 – 44. It refers to the data in Table 4.4.1-4, Comparison of Proposed Route to Proposed Route Segment 5/6 to Alternative Route M Segment 5/6.
- "Many of the routing factors considered above are similar between the two alternatives. Although alternative M segment 5/ is collocated with the I-88 corridor or other existing corridors for approximately 27 miles, the proposed route segment is 3.6 miles shorter overall. Alternative M segment 5/6 also crosses fewer forest interiors, Audubon-designated forest blocks of importance, property owners, and shallow bedrock areas. However, the proposed route segment 5/6 crosses fewer waterbodies, forested wetlands,

CO5-2 See the response to comment FA1-1. As stated in section 3.4.3.2 of the EIS, Commission staff recommended that Constitution should further assess minor route deviations or other measures to avoid, minimize, or mitigate potential impacts in coordination with the landowner. Constitution's fulfillment of this requirement required direct coordination with the Kernan Land Trust during its preparation and response. See the response to comment CO4-2. The Kernan Land Trust could provide comments to the FERC at any time during the environmental review process leading to issuance of the final EIS.

CO5-3 See the response to comment CO4-2.

CO5-4 See the response to comment FA1-1. Although approximately 24 percent of the parcels had not been surveyed in the field at the time of the draft EIS, it is not accurate to say that the EIS does not include any data for those parcels. As stated in section 1.2, desktop data sources were also used (such as aerial photography, topographic maps and databases for waterbodies, wetlands, endangered species, and archaeological sites) allowing for the consideration of resource data in areas without survey permission. If the project is certificated, then Constitution must survey all previously un-surveyed parcels (access might have to be obtained in some cases), and these new field data would be used during permitting to supplant and refine the data originally obtained from desktop sources.

CO5-5 We assume that the commentor is referring table 3.4.1-4, rather than table 4.4.1-4 (as there is no table 4.4.1-4 in the draft EIS) and that the referenced text is on page 3-40, not page 3-44. Table 3.4.1-4 provides a number of parameters to assist the comparison between the two routes. Selected parameters from the table were the focus of the summary text below the table. These selected parameters were chosen to highlight the most relevant and dissimilar differences between the two alternatives. The tables in the draft EIS present the specific quantities, while the text summarizes the data provided in the table. We re-checked the descriptive text on page 3-40 relative to table 3.4.1-4, and the summary text accurately matches the data in the table. Forested wetlands were described in the row labeled "palustrine forest wetland complexes crossed" on page 3-38 of the EIS and the data were not omitted from table 3.4.1-4.

COMPANIES AND ORGANIZATIONS

CO5 – Kernan Land Trust (cont'd)

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CO5-5
cont. and much fewer nearby residences and steep side slopes. Therefore, we do not consider adoption of alternative M segment 5/6 to be preferable to the proposed pipeline.”{

The paragraph names factors but not their quantities. According to the table, the Alternative Route will cross 11.6 miles less of forest interior, 2.4 miles less of Audubon-designated forest blocks of importance, will affect 113 fewer property owners, and cross 11.9 fewer miles of shallow bedrock. The Proposed Route will cross 10 fewer water bodies, affect 113 fewer nearby residence and 1.9 fewer miles of side slope construction. Table 4.4.1-4 does not list a factor of “forested wetlands”, so there are no data to support the statement that the proposed route segment 5/6 will cross “...fewer forested wetlands...”

The paragraph uses data selectively without stating its selection criteria. Table 3.4.1-4 lists 29 factors, while the paragraph refers to only 9 factors, ignoring the other 20 factors. No justification is provided for using these seven factors to conclude that the alternative route is not preferable to the proposed route

CO5-6 The table has no qualitative data and the paragraph ignores it. I-88 was built almost four decades ago and ever since has been causing significant negative impacts on the ecosystems in its corridor. While any wetland in the Alternative Route is almost certainly infested with exotic plant species, wetlands along the Alternative Route are less likely to be infested severely or at all with exotic species. The Clapper Lake – Mud Pond wetland complex on the Kernan Trust Land, for example, is pristine and has no exotic species.

CO5-7 The paragraph uses the factor of the number of nearby residences as an argument for selecting the proposed route. It gives no explanation of the significance of this factor. If FERC considers the pipeline unsafe, then it should not permit it to be built. If it considers that it would negatively affect the quality-of-life in these residences, it should consider that a buried pipeline will affect quality-of-life less than the constant noise from vehicles on I-88. The DEIS must explain the reasoning about this factor before the public will be able to make meaningful comments.

CO5-8 There is no reason to believe that the flaws of this single paragraph are atypical of the DEIS as a whole. To ask the public to make informed, substantial comments on a DEIS of such low technical quality is unreasonable. It is reasonable to request that FERC give the public an opportunity to comment on an improved DEIS. To do so requires FERC to extend the comment period.

CO5-9 FERC has given no justification to the public for restricting the comment period to 45 days and for making the end of the comment period coincide with the provision of additional information by Constitution. The DEIS is a long, complicated, obtuse document. Forty-five days to go through the DEIS and then write comments is far too short a time in the normal life of most. Yet the construction of this proposed pipeline would negatively affect thousands of lives, not only of those now living but those who are not yet born. Nobody whose lives and property the pipeline will affect should be rushed into making comments on this seriously flawed DEIS.

Sincerely,
Bruce S. Kernan

CO5-6

Given the subjective nature of qualitative data, we used a more direct comparison of alternative routes with the quantitative data provided in section 3.0 of the EIS. According to the National Wetland Inventory maps and wetlands data provided by the NYSDEC, the proposed pipeline route does not cross any wetlands on the Trust property; rather, it avoids them. We note that the proposed route would be located within the NYSDEC’s 500-foot-wide wetland boundary “check zone” surrounding the Mud Pond wetland, which could be either uplands or wetlands. We also note that consultants hired by the Trust asserted that the Clapper Lake and Mud Pond wetland complexes may be connected and indicated that additional study was needed in the Spring of 2014. Constitution’s wetland investigators do not have survey access permission for the Trust parcel and no party with property access has submitted a wetland delineation report to substantiate these claims to the FERC. We acknowledge the conclusion by the Trust’s environmental consultants that the Trust’s wetlands and interior forest do not contain invasive species.

CO5-7

The consideration of the number of nearby residences is not correlated to safety. The FERC takes into account the number of landowners that would be crossed by the pipeline and the number of nearby residences as social factors (in that an easement would restrict the construction of structures and cause some disruption during construction) that should be considered along with many other factors.

CO5-8

See the responses to comments FA1-1 and CO5-5.

CO5-9

The 45 day comment period is the FERC’s standard length comment period as dictated by 40 CFR 1506.10(c). See the response to comment FA1-1.

COMPANIES AND ORGANIZATIONS

CO5 – Kernan Land Trust (cont'd)

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The Henry S. Kernan Land Trust & The Charlotte Forest PO 317 / County Highway 40 / Worcester NY / 12197
Trustees: H. Devereux Kernan / Catherine S. Kernan / Bruce D. S. Kernan / Christopher N. Kernan / Patricia McC. Kernan

SENT VIA ELECTRONIC FILING

Reference: **DEIS Section 1.3 Pre-filing process, its use in project development, agency coordination, landowner notifications and communications, public participation**

OEP/DG2E/Gas 4
Constitution Pipeline Company, LLC
Constitution Pipeline Project
Iroquois Gas Transmission System, L.P.
Wright Interconnect Project
Docket Nos. CP13-499-000
CP13-502-000

Ms. Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
Washington DC 20426
Re: Docket No. CP13-499-000
Constitution Pipeline

cc. US Army Corps of Engineers
The FERC New York District, CENAN-OP-R
888 First Street NE, Room 1A Upstate Regulatory Field Office
Washington, D.C. 20426 1 Buffington Street, Bldg. 10, 3rd Floor

Dear Ms. Bose:

The following comments relate to **Section 1.3 Public Review and Comment** of the Draft Environmental Impact Assessment for the proposed Constitution Pipeline.

CO5-10 | In accordance with NEPA procedures for involving public participation in the preparation of the DEIS and thereby ensuring that its findings, conclusions and recommendations are based on complete information, Section 1.3 states "The purpose of the pre-filing process is to encourage the early involvement of interested stakeholders....and identify and resolve issues before an application is filed".

CO5-10

All comments submitted by the Kernan Land Trust to the Commission (either via mail or posted to e-Library) have been reviewed and considered by the FERC staff. As stated in the Trust's letter, the FERC staff met with members of the Kernan Land Trust in August 2012, engaged with Trust members at the FERC scoping meetings, and communicated informally over the phone during the pre-filing process. Additionally, after Constitution's application was filed, Trust members have also engaged with Constitution through the Commission's Dispute Resolution Service (1-877-337-2237).

As stated in the response to CO4-2, so as to not make the EIS too cumbersome, information provided by the public is generally summarized within the EIS, as the FERC's e-library serves as the full administrative record for the project. Generally, detailed information regarding individual parcels is not included within an EIS; however, we included a discussion of the Kernan Land Trust in section 4.8.4.2. In addition, we included a recommendation in section 3.4.3.2 of the EIS for Constitution to continue further coordination with the Kernan Land Trust with the purpose of either identifying an alternate route or otherwise describing how impacts on the applicable resources would be effectively avoided, minimized, or mitigated.

According to the information provided by the Kernan Land Trust and Constitution, and our review of wetland inventory maps, the proposed pipeline would not directly impact either the Clapper Lake or Mud Pond wetland complexes. The proposed route is located within the NYSDEC's 500-foot-wide wetland boundary "check zone" surrounding the Mud Pond wetland, which could be either uplands or wetlands. The Kernan Land Trust has denied access for Constitution's wetland survey crews and has not submitted its own wetland delineation report, as recommended by the FERC staff in its correspondence. The COE visited the subject property in July 2104 and ascertained that the proposed route followed an upland ridge and did not affect wetlands.

COMPANIES AND ORGANIZATIONS

CO5 – Kernan Land Trust (cont'd)

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CO5-10
cont. The experience of the Kernan Land Trust is that the process of pre-filing and post-filing consultations carried out by Constitution and FERC has been completely ineffective in achieving these stated purposes. Constitution, in our opinion, has used the consultation process only to attempt to intimidate us into granting it access to Trustee land and into signing a grossly unacceptable easement agreement. If the public consultation process has been carried out in this way in relation to the Kernan Land Trust, there is no reason to believe that it has been carried out more generally in the manner required by the National Environment Protection Act (NEPA). It is highly unlikely, therefore, that the pre and post-filing process has come anywhere close to achieving the open, objective, participative objectives that NEPA procedures require.

These unacceptable results of the consultative process have occurred with regard to the Kernan Trust Land in spite of substantial, prolonged and expensive efforts of the Trustees of the Kernan Land Trust to ensure that Constitution and FERC make their routing decision relative to its land based on high-quality and sufficient data. The contents of the DEIS indicate that our efforts have been almost entirely disregarded and dismissed. Constitution has refused to engage us in any sincere, meaningful or productive discussions. We provide the following points as our evidence for this conclusion.

- (1) I invited a staff member of FERC to meet the Trustees of the Kernan Land Trust, and to see the proposed location of the pipeline on Trust land. He, another FERC staff member, and two staff of FERC's environmental consulting company met with us in August 2012. We clearly and thoroughly expressed our concerns that the pipeline would cause irreversible, inevitable negative impacts on the ecology and species found in the hitherto pristine Clapper Lake-Mud Pond wetland complex, would cut through productive timber stands that produce the income to pay the costs incurred by the Trust, destroy part of the Trust's principal logging roads, and cross the only site on Trust property located in Delaware County where it is feasible to collect, buck and load logs. The FERC and consulting company staff were shown the pipeline location and the Clapper Lake-Mud Pond wetland complex. Their visit provided them only a cursory visual scan of the Clapper Lake area, and did not provide an in-depth assessment of the entire wetland complex and the relationship between the two lakes. **The Kernan Trust received no response or further communication from FERC, the consulting company or Constitution.**
- (2) At several open houses and scoping meetings Trustees expressed verbally their concerns about the negative effects of the pipeline on the Clapper Lake-Mud Pond wetland complex. The methodology Constitution used for conducting these meetings clearly was designed to prevent attendees from asking questions and receiving clear answers. Constitution's representatives were dismissive and even scornful to the participants. **In our case specifically, they made no effort to solicit information from the Trustees or to resolve issues that concerned them about siting the pipeline through the Clapper Lake-Mud Pond wetland complex.**
- (3) Since 2012, a Trustee has communicated by telephone several times with the FERC representative, reiterating many times the Trust's concerns that the location of the pipeline through the Clapper Lake-Mud Pond wetland complex would inevitably cause

COMPANIES AND ORGANIZATIONS

CO5 – Kernan Land Trust (cont'd)

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CO5-10
cont.

intense, irreversible, negative environmental impacts. **No one from FERC, the consulting company or Constitution has responded to these concerns even by soliciting additional information or data. Nor has any representative from FERC or the consulting company or Constitution suggested any feasible means to avoid or significantly reduce the negative environmental impacts that the location of the pipeline across the Clapper Lake-Mud Pond wetland complex would cause.**

- (4) Although impacted landowners are under no obligation to submit comments on a proposal before FERC, in August and September 2012, Bruce, Catherine and Christopher Kernan each submitted comments with the Commission listing the impacts that the proposed project would have on Trust lands, emphasizing the unique characteristics of the Clapper Lake – Mud Pond wetland complex and the inevitable, irreversible negative impact that construction of a pipeline. **Constitution's Draft Resource reports give no indication that these comments were considered and suggest no action to resolve the environmental issues the comments raised.**

CO5-11

- (5) In September 2012 one of the Trustees sent a letter to and had a meeting in Washington, D.C. with his Congressman, Chris Gibson, to ask for assistance in conveying the Trust's concern about the pipeline running through the Clapper Lake – Mud Pond wetland complex. Congressman Gibson sent a communication to FERC asking it to look carefully at the situation of the Trust property and the environmental effects that the pipeline would cause to its wetlands. **Congressman Gibson has not communicated to the Trust that he received any response from FERC so we can presume that he did not.**

CO5-12

- (6) In late August 2013, the Trust asked for a meeting with Constitution Pipeline. Initially, the Trust was told that a representative of Constitution was too busy to meet with the Trustees. Eventually, two representatives from Doyle Land Services met with the Trustees and their attorney. They had no knowledge of the environmental impacts or the filings that the Trustees had made with the Commission and showed no interest in soliciting more information about the environmental aspects of the Trust property they desired to secure for the pipeline. Since the representatives Constitution sent to this meeting had no power to discuss anything, and expressed no interest in learning more about the issues or the land over which they were planning to put the pipeline, the meeting produced no useful result. Indeed, the Trustees received the clear impression that the Doyle representatives considered the main purpose of the meeting was to communicate forcefully that it would be impossible to adopt route modifications now that Constitution had filed its application with FERC. **Rather than try to resolve the issues, the representatives tried to intimidate the Trustees with inaccurate information since, in fact, FERC procedures permit applicants to amend or update readily a project proposal, particularly to settle disputes.**
- (7) In the spring of 2013, the Trustees contracted Bagdon Environmental and Hudson Highlands to assess the environmental impacts that the location of the pipeline through the Clapper Lake – Mud Pond wetland complex would cause and to identify alternative routes for the pipeline. Both environmental consulting firms concluded, on the basis of

CO5-11

The FERC Chairman at the time, Jon Wellinghoff, responded to Congressman Chris Gibson's October 5, 2012 letter on October 22, 2012. A copy of the letter was filed on e-Library on October 22, 2012 and can be found at http://elibrary.ferc.gov/0/idmws/file_list.asp?document_id=14062445. Chris Gibson has submitted several letters to the Commission on behalf of various parties, all of which have been responded to by the Chairman.

CO5-12

The comment is noted regarding the extensive communications between the Trust, Constitution's representatives, and the FERC staff, as well as the information that the Trust has provided to the FERC staff. Although the FERC staff encourages early coordination and timely resolution of landowner concerns where possible, route modifications certainly can be made after an application is filed. Constitution has adopted numerous route variations over the course of the project as described in section 3 of the EIS. See the responses to comments CO4-2 and CO5-10. We recommended in section 3.4.3.2 of the draft EIS that Constitution further assess minor route deviations and other measures to avoid, minimize, or mitigate impacts on the subject property (parcel ID NY-DE-226.000), and section 4.8.4 of the EIS specifically mentioned the Charlotte Forest, the commentors' concerns about interior forest, invasive species, and the Clapper and Mud Lakes wetland complexes. Given these direct mentions of the subject property in the draft EIS, it is not accurate to say that the commentor's concerns were not identified in the draft EIS or that they were ignored by the FERC staff. Further, the FERC issued an environmental information request to Constitution on May 14, 2014 regarding alternative routes suggested by the land trust and its agents, and other mitigation measures such as the possibility of an HDD or deep burial of the pipeline at the subject property. See section 3.4.3 for additional assessment and updated information for this parcel.

COMPANIES AND ORGANIZATIONS

CO5 – Kernan Land Trust (cont'd)

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CO5-12
cont.

extensive field work, that the Clapper Lake – Mud Pond wetland complex has characteristics almost unique in the Catskill Region because of its size and especially because it has no exotic species. Bagdon Environmental and Hudson Highlands identified several potential alternative routes. A draft of these alternative routes was sent to Constitution's environmental officer. **Constitution responded with a routine, standard form letter saying Constitution had already examined all alternatives and rejected them for engineering reasons and because it was too late in the process to change the route.** Note that at this time not even Constitution's Draft Resource Reports had been completed, let alone the DEIS. If Constitution considers its route fixed, even at such an early stage in the design and approval process, then it seems unlikely that it takes public participation in the environmental impact assessment process at all seriously, since altering the pipeline route is obviously a principal means to avoid negative environmental impacts.

(8) Between September and November 2013, the Trust submitted a proposed route alternative to Constitution and attempted, with the assistance of the Trustee's New York State Senator, to engage in discussions with high-level Constitution officials to explore alternative routes would irreparable negative impacts on the Clapper Lake – Mud Pond wetland complex. As part of the discussions, Constitution sought permission to enter the Trust's lands to survey the property. The Trust agreed, provided that Constitution agreed also to study alternative routes. In response, Constitution did not offer to examine alternative routes or express any concern or offer any measures to avoid, mitigate or minimize the negative environmental impacts of the pipeline on the Clapper Lake – Mud Pond wetland complex. **Rather than solicit information from the Trustees or offer solutions to avoid the negative environmental impacts of its proposed route through the Clapper Lake – Mud Pond wetland complex Constitution offered, via a standard form letter, to pay for an easement if the Trustees agreed to the terms of its easement agreement before a certain date. This was a financial threat. The Trustees refused to accept this arrangement, considering it to essentially be a financial bribe in exchange for the destruction of the property they are legally responsible for protecting. Constitution did not attempt to discuss the Trust's decision or offer means to resolve the issue. Rather it informed the Trust that it would no longer consider any alternatives to its preferred route and, in a letter, unilaterally terminated further discussions with the Kernan Land Trust.**

(9) On December 5, 2013, the Kernan Land Trust filed extensive comments on the Constitution proposal to route the pipeline through the Clapper Lake-Mud Lake wetland complex. Appendix A of the Trust's December 5, 2013 comments to FERC was a letter to the Trust from Dr. Bernard Blossey, Director of the Cornell University New York Invasive Species Research Institute in which, among other points, he states:

Your property and particularly the areas between Mud and Clapper Lake are prime examples of habitats and communities that have not suffered from such disturbances and have thus far remained in a pristine state. Protection of habitats that are not invaded by introduced species should receive the highest priority. Nationwide assessments by the National Research Council have shown that restoration of degraded wetlands is nearly

COMPANIES AND ORGANIZATIONS

CO5 – Kernan Land Trust (cont'd)

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CO5-12
cont.

impossible and likely to fail. Your property qualifies as such a unique place that I consider it the social responsibilities of those proposing a pipeline construction to avoid the destruction of intact plant communities at all costs if alternatives are available.

(10) Appendices B and C to the December 5, 2013 comments were reports from the Bagdon Environmental and Hudson Highlands environmental consulting firms that clearly concluded that the location of the pipeline through the Clapper Lake – Mud Pond wetland complex would inevitably and irreversible affect its almost unique ecological characteristics.

(11) Appendix B of the December 5, 2013 comments referred to a memorandum from Dr. Young, of the New York State Natural Heritage Foundation stating Clapper Lake

... is the second dwarf shrub bog documented in Delaware County and 2nd largest documented from the four county Catskill Region (Delaware, Greene, Sullivan, and Ulster)" and "... is the third bog lake documented in NY and would be the first one documented outside of the Adirondack Park. It is almost as large as the state exemplary example (Helldiver Pond 15.22 acres; A rank)... the black spruce-tamarack bog (10 acres; tentative EO rank B) would be the 2nd bog documented from the four county Catskill Region (Delaware, Greene, Sullivan, and Ulster) and the first one documented in Delaware County.

In reference to Mud Pond, Dr. Young stated

This fen is larger than average for this type in the state (avg. 27.6 acres). It would be the largest of six inland poor fens documented from the High Allegheny Plateau Ecoregion. It would be the first one documented from the four-county Catskill Region (Delaware, Greene, Sullivan, and Ulster).

(12) On January, 2014, Ms. Carolyn Elefant, a lawyer contracted by the Kernan Land Trust, sent a letter to FERC stating

Since August 2012, the Trust has attempted to bring the impacts of the pipeline on its unique property to the attention of Constitution and the Commission. The Trust participated in both the pre-filing and formal application proceedings, met with Commission staff and attempted to negotiate a route alternative directly with Constitution. Yet in spite of these efforts, Constitution did not even mention the impacts to Trust lands in its certificate application and rebuffed the Trust's proposed route alternatives.

The letter also documented the Trust's

... adherence to Commission regulations and its extensive efforts to raise its concerns early on... that its proposed alternatives are not merely preferable but are required under applicable Commission regulation and precedent and said "...the Trust remains hopeful that it can reach an agreement with Constitution to adopt one of the proposed

COMPANIES AND ORGANIZATIONS

CO5 – Kernan Land Trust (cont’d)

S-203

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CO5-12
cont.

alternatives and avoid the Trust lands... and asked the Commission ...to refer this matter to the Commission's Dispute Resolution Division where the parties can enter into an agreement to avoid the trust property.

Clearly, the Trust has gone to great lengths to do its part to assist FERC to achieve the objective stated in Section 1.3 of the DEIS, both before and after Constitution filed its application with FERC, of encouraging the early involvement of interested stakeholders and identifying and resolve issues. Equally clearly, Constitution (and FERC) have ignored the attempts of the Trustees to assist FERC to "... identify stakeholders, to encourage early involvement of interested stakeholders...and identify and resolve issues..." Consequently, no resolution of any of the issues the Trustees have raised with the routing of the pipeline through the Clapper Lake – Mud Lake wetland complex were resolved before release of the DEIS.

The DEIS does nothing to identify and resolve the issues that the Kernan Land Trust has raised repeatedly about the negative effects of placing the pipeline across the pristine Clapper Lake-Mud Pond wetland complex. Although it never mentions Kernan Trust lands specifically, the DEIS appears to referring to them in the following sections of the DEIS:

- **MP 90.0:** "This deviation was developed to avoid forested land. This route deviation was not adopted. Constitution determined that re-route affects several new landowners to avoid one landowner. The route adds several additional turns and is not the most favorable route. This reroute is also close to a cemetery at Titus Lake Rd. crossing. It also parallels propane line that has had issues in the past."
- **Mile Post 90.8:** "This deviation was developed to avoid sensitive land features. This route deviation was not adopted. Determined that re-route would impact 26 new landowners if implemented."
- **Chapter 3, p 3-60 Table 3.4.3-1:** In this table, land parcel NY-DE-137.000 is listed as one of 13 properties for which FERC is "...requesting that Constitution provide additional information as described above".

These references to the Trust land in the DEIS are misleading, confusing, incomplete and inaccurate. In themselves, they indicate that the process for preparing the DEIS has completely failed to achieve the purpose of public consultation and resolution of issues noted at the beginning of Section 1.3. The following points support this conclusion:

- (1) In Appendix H, the note regarding the proposed deviation at MP 90.0 states that it "...was developed to avoid forested land" and the note regarding the proposed deviation at MP 90.8 says it was "developed to avoid sensitive land features". . Yet in Chapter 3, Table 3.4.3-1 says that the deviation at MP 90.8 "was developed to avoid forested land". **The DEIS, itself, therefore, gives so little importance and consideration to the Kernan Trust comments and concerns that it is even inconsistent and confused about the reasons its for not accepting any of the Trust's proposed alternatives.**

COMPANIES AND ORGANIZATIONS

CO5 – Kernan Land Trust (cont'd)

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CO5-12
cont.

(2) The Trust, as noted above, has repeatedly, verbally and in written form, communicated its concern that the proposed route through Trust land would cause inevitable, irreversible and intense negative impacts on the currently pristine Clapper Lake – Mud Lake wetland complex. Yet the DEIS, as noted in (1) says that the deviations were developed to avoid “forest land” and “sensitive features”. The use of these terms in itself indicates that that the DEIS ignores the unique characteristics of the Clapper Lake – Mud Lake wetland complex, although, as described above, the Trust has repeatedly communicated these characteristics to FERC and Constitution and they are based on detailed field studies by respected professional environmental scientists. In fact, the use of the terms “forested land” and “sensitive features” could be reasonably interpreted as serving to minimize the uniqueness of the Clapper Lake – Mud Pond wetland complex, since the DEIS never uses the term wetland to refer to the location of the pipeline between MPs 90.0 and 90.8. **Again, the DEIS fails completely to comply with its own stated purpose of obtaining and using stakeholder knowledge and resolve issues noted by stakeholders.**

(3) Mr. Stockton, spokesperson for Constitution, in response to a filing with FERC made by New York State Senator Seward requesting that FERC and Constitution carefully review the negative impacts of the proposed pipeline route if it were to be sited across the Clapper Lake – Mud Pond wetland complex publically admitted that he had no specific knowledge of the Kernan Trust land. **This statement of Mr. Stockton clearly shows that Constitution had given no attention or importance to the information that the Kernan Land Trust had sent it, thereby again violating the purpose of the public consultation process.**

(4) As mentioned above, Appendix A to the Trust’s December 5, 2014 contains a letter to the Trust from Dr. Bernard Blossey, the Director of the Cornell University Institute for Invasive Species, a specialist in the identification and control of exotic invasive species with more than 30 years of experience. The letter clearly states that the location of the pipeline through the currently pristine Clapper Lake – Mud Lake wetland complex would inevitably and irreversibly cause its infestation with aggressive, exotic plant species. The DEIS completely ignores this information provided to FERC and Constitution in referring to “forest land” and “sensitive features”. **Yet again the DEIS fails to take into account solid, relevant, scientifically valid information provided to it by a stakeholder and fails to provide any means to resolve the issue the stakeholders have raised, thereby violating the purpose of public participation stated at the start of Section 1.3 and an integral part of the environmental review process required by NEPA.**

In summation, the purpose of the process of public consultation and issue resolution stated in Section 1.3 of the DEIS has seriously failed in relation to Kernan Land Trust. If it failed with the Kernan Land Trust, it is extremely unlikely that the same organizations using the same methodologies and processes, succeeded in achieving effective public participation and resolution of issues along all of the rest of the 124.4 mile proposed route with over a thousand other landowners. We strongly believe that FERC whose responsibility it is to implement the terms, meaning and spirit of the NEPA, should not allow the environmental review process the proposed Constitution pipeline to remain as it has thus far simply a means for Constitution to

COMPANIES AND ORGANIZATIONS

CO5 – Kernan Land Trust (cont’d)

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CO5-12
cont.

ignore and obfuscate serious environmental issues with its preferred route for its pipeline. FERC should not give Constitution’s priorities for building the pipeline rapidly and at least possible cost, more consideration and weight than the interests of those of us who live along the proposed pipeline’s proposed route in protecting our property values and environment. In the specific case of the Kernan Land Trust, FERC should not accept how Constitution has refused to recognize the significant, irreversible, damage the construction of a pipeline through the Clapper Lake – Mud Lake wetland complex would cause to a pristine environment.

Sincerely,

Bruce S. Kernan

COMPANIES AND ORGANIZATIONS

CO6 – State University of New York



Biology Department
112 Science Building 1
State University of New York
Oneonta, New York 13820-4015
(607) 436-3703 Fax: (607) 436-3646

Memorandum

To: Federal Energy Regulatory Commission (FERC)
From: Sean C. Robinson, PhD
Re: Proposed route of pipeline through Kernan Land Trust Property Harpersville, NY
Date: February 1, 2014
To Whom It May Concern:

CO6-1

I am a Botanist in the Biology Department at the State University of New York College at Oneonta with expertise in *Sphagnum*, a significant component of wetland ecosystems. My interest in the Kernan Land Trust property has to do with its value from both a conservation and education stand point. As a research scientist and educator, I have spent a significant amount of time in a variety of wetland complexes throughout the Northeastern United States and find this property to be of tremendous value to New York State, and in particular, to the central New York region.

Recently, I had the opportunity to survey Clapper Lake and one section of the adjacent Mud Lake. Ecologically, this is an outstanding site that harbors a diverse assemblage of aquatic and terrestrial vegetation. The wetland communities at Clapper Lake are unlike any I have seen in this region. The only comparable systems I have seen are those that can be found in isolated, protected areas within the interior of Adirondack Park. In particular, the lack of invasive species makes this property very unique and extremely valuable. The importance of this simple fact cannot be understated. It is obvious that Clapper Lake and the surrounding forested area have been well maintained by the Kernan Family.

In addition to its ecological value, this property presents an exceptional educational resource for academic institutions in this region. For this reason, SUNY-Oneonta has been in discussions with the Kernan family to use this property as a site for outdoor class instruction and the development of field-based research projects to be carried out by faculty, undergraduate, and graduate students. Since starting my teaching career at SUNY-Oneonta in 2010, I have taught a number of field courses and have advised a

CO6-1

See the responses to comments CO5-2, CO5-6, and CO5-10.

COMPANIES AND ORGANIZATIONS

CO6 – State University of New York (cont'd)

S-207

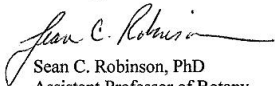
CO6-1
cont.

number of undergraduate and graduate students on botanically based research projects. My colleagues and I are very excited about the educational potential that the Clapper Lake property presents. The uniqueness of this site will allow for new course development and research opportunities that have not been available to us in the past.

Given the overwhelming value of the Clapper Lake property, I am extremely concerned about the proposed pipeline routing through the Charlotte Forest. Countless studies have shown the devastating impact that disturbances like this can have on ecological communities. The establishment of such pipelines has been found to be a major vehicle through which nuisance species invade natural communities. Phragmites and purple loosestrife, in particular, are aggressive problem species in our area that have been expanding their range through the dissemination of propagules by construction activities, and have proven difficult if not impossible to manage. Furthermore, this pipeline would result in the fragmentation of the forest community around Clapper and Mud Lakes. The impact of fragmentation on the long-term integrity of forest systems has been well documented. Even narrow, seemingly insignificant, right-of-ways have been shown to have large-scale effects on a number of plant and animal species in forested habitats.

In my opinion, the routing of a pipeline through the Kernan Trust Lands could result in the loss of a tremendously valuable ecological and educational resource unique to the central New York region. The proposed rerouting of this pipeline through an area where other right-of-ways already exist is more than feasible and makes a lot more sense. I strongly urge you to seriously consider this rerouting in order to protect both the Clapper Lake and Mud Lake wetland complexes.

Sincerely,



Sean C. Robinson, PhD
Assistant Professor of Botany
Biology Department
112 Science Building 1
State University of New York
Oneonta, NY 13820

COMPANIES AND ORGANIZATIONS

CO7 – Concerned Citizens of Trout Creek, NY

Howard Hannum
1221 Higley Rd
Sidney Center, NY 13839

March 14, 2014

Kimberly D. Bose, Secretary
The FERC
888 First Street NE, Room 1A
Washington, D.C. 20426

US Army Corps of Engineers
New York District, CENAN-OP-R
Upstate Regulatory Field Office
1 Buffington Street, Bldg. 10, 3rd Floor
Watervliet, New York 12189-4000

Re: Docket Nos. CP13-499 and CP13-502; NAN-2012-00449-UBR

I write today representing the Concerned Citizens of Trout Creek, NY (CCTC), a group located just off the main corridor of the pipeline route between Sidney Center, NY and Franklin, NY in Delaware County.

CO7-1 | I have been granted intervenor status under this heading. In regard to your issuance of the Draft E.I.S. for the Cabot/Williams Partners project known as the Constitution Pipeline, I am writing to request delaying the release of this document. While I agree with your assessment that there is a "real" need for a slope stability analysis for the area in and around mile post 30.3, I would request the same consideration for the entire region between Windsor, NY and Sidney, NY as well as the area between Unadilla, NY and Franklin, NY. These areas are very hilly and very rocky and this project will be laid on some very steep slopes in both of these regions. Masonville, NY is home to two quarries in the region and it is quite hilly around the area where the pipeline is targeted. A full slope stability analysis done by a qualified neutral party would be nothing short of satisfactory, and would be expected for a Federal Project of this nature.

CO7-2 | Furthermore, ample time to review the results of those analyses would also be requested at this time. You also mention in your report that you issued a request for a full Geo Technical Test, and yet we see nothing of this test or its results and we would need ample time to review the results of those tests as well. We would sit down with qualified personnel to review the geo tech. tests. You have mentioned that the Williams/Cabot and Iroquois Spill Plans are on stand-by to be implemented during construction and operation. We here at the CCTC would like to see and review the spill plans for both of these companies and we would like time to review the plans with qualified NY State licensed personnel as well as an EMS representative from the following local Fire departments: Sidney, Deposit, Afton, Masonville, Sidney Center, Trout Creek, Franklin, Walton, East Meredith, Samford and Windsor.

CO7-3 | We do not think it is prudent to issue a Draft EIS document of this magnitude and nature at this time. There are too many important tests missing and not submitted and the results of those tests need to be reviewed by qualified NY State licensed personnel.

Thank you,

Howard Hannum
Concerned Citizens of Trout Creek

CO7-1 | See the response to comment FA1-1. Section 4.1.3.4 of the EIS has been revised to clarify that the geotechnical consulting firm hired by Constitution evaluated the entire proposed route for areas of steep slopes and karst features. This evaluation used publically available "desktop" data sources for the broader assessment, which was supplemented by limited field data.

CO7-2 | Recommendations in the draft EIS were provided to Constitution the same time as the public. Constitution was not given notice of these recommendations prior to issuance of the draft EIS. As stated in section 4.1.1.2 of the EIS, if the projects are approved, Constitution would be required to provide pending geotechnical studies prior to the start of construction. These reports would be available to the public on e-Library. Constitution's Spill Plan for Oil and Hazardous Materials and Iroquois' Spill Prevention, Control and Countermeasure Plan are also on e-Library, and their current versions (which were revised per the FERC and stakeholder comments) have been available for public review since November 11, 2013 (Constitution) and June 13, 2013 (Iroquois).

CO7-3 | The commentator's statement regarding delaying issuance of the draft EIS is noted. Also see the response to comment FA1-1.

COMPANIES AND ORGANIZATIONS

CO8 – Center for Sustainable Rural Communities

Center for Sustainable Rural Communities
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March 15, 2014

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RE: Docket Nos. CP13-499 and CP13-502, NAN-2012-00449-UBR

CO8-1 **Comment: The Potential for Physical and Cyber-Attacks against the Proposed Constitution Pipeline and the Subsequent Impacts on Populations and Eco-Systems.**

1.0 Summary

The Center for Sustainable Rural Communities (CSRC) is a 501 (C)3 non-profit New York Corporation that advocates for vibrant, livable and sustainable rural communities in Upstate, New York. CSRC encourages environmentally-compatible economic development, access to arts and technology and progressive community and land-use planning while working to preserve the rural character and ecological and cultural diversity of the region.

The CSRC, an Intervener on the matter of the proposed Constitution Pipeline (Docket No. 13-499), is responding to the many concerns expressed by residents of Schoharie, Delaware and Otsego counties by presenting the comments contained in this document. The comments address the failure of FERC's Draft Environmental Impact Statement (DEIS) to adequately and substantively identify the potential impacts of a physical and/or cyber-attack against the proposed Constitution Pipeline, on communities and eco-systems and a viable mitigation strategy to prevent or reduce those impacts.

This document details the perspectives, concerns and comments of subject matter experts in the disciplines of physical and cyber-security. Those experts submit herein that the DEIS fails to adequately address the susceptibility of the proposed pipeline and its control systems to multiple vectors of attack and the subsequent vulnerability of populations and ecosystems along its route to the consequences of those attacks.

CO8-1 The Center for Sustainable Rural Communities' (CSRC) introduction is noted. See the response to comment FA1-1 regarding adequacy of the EIS. Terrorism is discussed in section 4.12.1 of the EIS.

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CO8-1 cont'd	<p>Further, the DEIS does not recommend a standards-based risk assessment methodology to identify potential threats nor does it define or require specific best practice strategies and controls to mitigate threats that could result in catastrophic impacts on human life and eco-systems.</p> <p>By the omissions stated, the FERC has failed to consider the full breadth of potential environmental, economic, and psychological impacts that could result from the vulnerability of the proposed pipeline to malicious activity by individuals and/or groups.</p>
CO8-2	<p>2.0 Commenter's Credentials</p> <p>Robert Nied has had a four decade career addressing issues related to security and regulatory compliance, including responsibility for the security of <i>Verizon Communication's</i> North American network infrastructure. He participated in that organization's international incident response team, which investigated cyber and physical security breaches in North America, South America and Asia. Following retirement from <i>Verizon</i> Mr. Nied served as the Information Security Officer (ISO) for the largest agency in New York State government – the <i>Department of Correctional Services</i>, where he developed a state-wide security framework and directed investigations of security incidents and identified mitigation strategies in response to those incidents.</p> <p>For twelve years Mr. Nied maintained the credential of Certified Information Systems Security Professional (CISSP) and contributed testing materials for the certification of other information security professionals. Semi-retired, Mr. Nied now holds certification in Homeland Security-Level III from the <i>American Board for Certification in Homeland Security</i> and is listed as a national subject matter expert on security and crime prevention by the <i>Homeland Security Speakers Bureau</i>.¹</p> <p>Mr. Nied serves as the Chief Executive Officer and Practice Lead of the Robert Nied Consultancy Group, a security and regulatory compliance consulting firm with clients in the United States and the European Union. Mr. Nied's firm provides guidance to government agencies and corporations on protecting sensitive data and infrastructure, incident response, disaster recovery, business continuity and pandemic planning.</p> <p>Mr. Nied is a published author, lecturer and contributor to publications of the <i>National Bar Association, Section of Science and Technology Law</i>, including "A Roadmap to an Enterprise Security Program" (SBN-10:1590315014 ISBN-13: 9781590315019). He is considered a subject matter expert on social engineering and other personnel-centric attacks on critical infrastructure.</p>

¹ <http://www.homelandsecurityspeakersbureau.com/categories/o.php>

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CO8-2 The credentials of the commenters are noted.

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Mr. Nied has developed security policies and procedures for Fortune 100 companies as well as State and County governments. Under his direction, his firm conducts physical and cyber security assessments for clients in multiple public and private sectors.

Don Airey has extensive experience in the fields of anti-terrorism, explosives and pandemic detection. Mr. Airey has had a thirty-five year career in the anti-terrorist security screening/ detection industry. He served as the General Manager of *Security Defense Systems*, a company specializing in the field of anti-terrorism equipment, technologies and systems for over twenty-five years. He is currently the owner and General Manager of *Defense Equipment Supply Company & Associates* which provides X-ray and other detection technologies to industry and government agencies.

Mr. Airey is a thirty-year Regular Member of the prestigious *International Association of Bomb Technicians and Investigators* (IABTI). He has invented and manufactured improvised explosive device (IED) detection/imaging systems and related equipment and has served as a consultant to industry and government for those applications as well.

Mr. Airey has served as a contractor for the U.S. Army, U.S. Navy, Federal Reserve Bank, U.S. Secret Service, Federal Bureau of Prisons, U.S. Department of State Embassy Protection/Security Programs, the Federal Aviation Administration and a variety of Federal, State, County and municipal government entities as well as law enforcement agencies and corporate clients.

CO8-3

3.0 The Current Threats and Countermeasures Environment

3.1 Physical Attacks on Pipeline Infrastructure

The proposed 30" natural gas Constitution Pipeline would traverse more than one hundred and twenty miles of rural Upstate, New York and represents a potential terrorist target of significant importance and concern. As early as 2003, even before the recent proliferation of domestic pipelines in response to increased natural gas supplies from the Marcellus and other shale sources, Gal Luft and Anne Korin of the *Institute for the Analysis of Global Security* stated succinctly "[p]ipelines in the U.S. are (also) vulnerable."²

² *The Journal of International Security Affairs*, December 2003.

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The potential threats listed by the commenters are noted. Almost all of the proposed pipeline facilities, not including aboveground facilities, would be buried at least 36 inches underground in soil or 24 inches in bedrock thereby making intentional damage difficult relative to more easily accessible targets. Aboveground facilities would be enclosed with security fencing. There are thousands of miles of existing pipelines and associated facilities in Pennsylvania, New York, and in the region and there is no indication that the Constitution pipeline would be especially attractive to terrorists.

Constitution stated that the natural gas pipeline industry (which would include Constitution's parent company, Williams Gas Pipeline Company, LLC), has worked and is working in conjunction with the U.S. Department of Homeland Security, and has been diligent in taking steps to safeguard critical facilities against terrorist threats. The pipeline pressures would be monitored 24 hours per day by Constitution's Gas Control office, and operational personnel would conduct regular field patrols. Constitution stated that it could not provide additional details regarding threats or countermeasures in the public arena without jeopardizing security. We concur.

As stated in section 4.12.1 of the EIS, unfortunately we are unable to provide more details in this analysis. The Commission is faced with a dilemma in deciding how much information can be shared to the public while still providing a significant level of protection to infrastructure facilities. The comment stating that the road leading to the Wright Compressor Station is a designated evacuation route is noted.

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Just a year later evidence that international terrorist groups were planning to target oil and gas infrastructures rose to prominence when The Riyad us-Saliheyn Martyrs' Brigade, a Chechen lead Islamic terrorist group, claimed responsibility for multiple attacks on pipelines in the Middle East.

In March 2008, Jund al Yemen Brigades, an al-Qa'ida affiliate, launched a bomb attack against a Total SA pipeline in the Sah Valley of Yemen.³

On January 3, 2012 an armed terrorist group detonated an explosive charge to damage a 24-inch Syrian natural gas pipeline.⁴ International security reports are replete with accounts of successful and foiled attacks on gas and oil infrastructures.

Since those early incidents attacks on gas and oil pipelines have increased and those attacks have not been limited to destabilized foreign states. In August of 2011 an Oklahoma man was arrested for allegedly placing an improvised explosive device (IED) under a domestic natural gas pipeline. The alleged bomber called the Seminole County Sheriff's Office 911 Center saying he wanted to turn himself in, stating "I set the bomb under the pipeline in Okemah."⁵

In 2008 the *Transportation Security Administration (TSA) Office of Intelligence* stated "the U.S. system and its related infrastructure remain an attractive target to both terrorists and domestic extremists alike, as long stretches of open unattended pipeline are difficult to protect and the economic impact of attacks would be significant."⁶

The TSA's report went on to say that "Al-Qa'ida, in particular, has noted potentially damaging impacts of pipeline attacks, both in the United States and abroad, would have on the Homeland's economy, national security, and public health and psychology. Al-Qa'ida's demonstrated capability and intent to target oil and gas infrastructure overseas, and the group's desire to continue attacks in the Homeland, suggest similar attacks could occur inside the United States." The TSA added that "[s]ingle issue extremist groups, industry insiders, and lone wolves may also pose a threat to the pipeline system."

³ Oil & Gas Journal Exchange, April 7, 2008.

⁴ http://www.upi.com/Business_News/Energy-Resources/2012/01/03/Terrorists-attack-Syrian-gas-pipeline/UPI-26841325598451/#ixzz2svSYh8OU.

⁵ CNN Justice <http://www.cnn.com/2011/CRIME/08/12/oklahoma.pipe.bomb/index.html>.

⁶ *TSA Pipeline Threat Assessment*, October 23, 2008.

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cont'd

Given the heightened interest in pipelines on the part of a wide-spectrum of malicious groups and individuals, the proposed Constitution Pipeline would represent a potentially attractive target for domestic and international terrorists.

Miles of its length would be located in relatively remote an unattended forested and agricultural areas with little or no physical security. Many of the communities through which it would be routed have no municipal police departments and are subject to only sporadic patrols by County Sheriff departments and/or State Police. Even when those patrols occur, most would likely not be in proximity to the proposed route, much of which follows ridge tops and traverses forest and wetland areas.

Because much of the proposed route traverses rural communities in which off-road vehicular activity, as well as gunfire related to hunting and target practice, is commonplace, little attention would be paid to malicious activity targeting pipeline infrastructure. Contractor yards, valves and compressor stations could be especially attractive targets because of the potential for dramatic and disruptive consequences of executed attacks.

Unfortunately, natural gas pipelines present themselves as easy targets IED destruction by their very nature of providing the accelerant forces required for events of mass destruction. This differs from most IED targets in that in other cases the IED itself must be of significantly large and powerful size and force to produce the desired damage, overpressures, fire, blast pressure, etc. In the case of natural gas the IED can be constructed to be very small in terms of size and blast pressure.

This reality increases exponentially the risk and impacts of an IED attack and the level of difficulty in mitigating that risk. This can be explained in terms of explosives terminology quite simply; the IED takes on the role of “detonator”, rather than the more complex, extensive and larger nature of the explosive device or accelerant itself. The pipeline and its pressurized contents provide the components necessary for a catastrophic explosion in response to the IED detonation creating a threat environment with a “perfect storm” of simplicity of execution, non-complex attack vector and difficulty of mitigation.

Therefore, in view of the above, a catastrophic event can be initiated with a very small amount of either military type of explosive (C4, Semtex, etc.) or, via the more readily available type(s) such as commercial construction grade materials including traditional dynamite, TNT and other lower order but yet as effective nitro-based compounds including dynamite. Additionally, the potential for the use of homemade, commercially made or military grade “shaped or cutting charges” introduces the possibility that

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smaller and more easily transported and concealed IED could be used to a terrorist attack on the pipeline infrastructure.

Ironically, commercial grade explosives and accessory elements such as detonators, squibs, etc. may well be readily available to a potential terrorist because of their anticipated use in the blasting process identified by Constitution in its Resource Reports. Areas identified by Constitution as “Contractor Yards” may be used to house and store explosives and would provide little real security from organized and motivated theft. Once acquired, this explosive material could be held until completion and charging of the pipeline with natural gas.

This poses a serious threat to all unless proper mitigation can be instituted. However, with no mention of such threat(s) contained within the DEIS and no reference to controls and protections other than a causal nod to certain regulations, it is difficult to imagine the institution of proper and adequate mitigation measures, controls or protections.

The proposed pipeline would also transverse a large area of rural agricultural landscape. This could make the availability of large amounts of nitrate-based fertilizers, a powerful bomb-making component, readily obtainable without the usual concern or alarm such purchases could raise in urban or suburban areas due to the normal large-scale use of such material in the agricultural industry and community. It would simply be “business as usual” in agricultural areas. However, the type of IED that could be constructed, transported and initiated could be of a magnitude that may dwarf the Oklahoma City bombing in terms of its destructive killing force and radius. The DEIS makes no mention of increased monitoring of such purchases either during or after construction. Even with increased vigilance, the acquisition chain, either via purchase or theft would be impossible to truly negate in agricultural areas particularly. Hence, a heightened potential for such a device or compound to be constructed and delivered to target unnoticed and undetected.

The above described scenarios apply primarily to exposed (unburied) areas of pipeline. However, compressor stations, metering stations and main line valves provide not only for unburied access to the actual pipeline itself, but also provide a potential for other types of terrorism heretofore unaddressed by Constitution and unexamined in the DEIS.

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3.1.1 Wright Compressor Station

The expanded compressor station in the Town of Wright (Schoharie County) is located in a rural area (See Figure 1) with low population density and has no substantive physical security controls. The entrance driveway to the facility is un-gated (See Figure 2) and the facility itself is protected by an easily breached, low chain link fence (See Figure 3).

The facility can be approached on several sides through open fields and hedgerows. It is unknown (and undefined in the DEIS) how many personnel would be present at the Wright station on a twenty-four hour bases or what type of mechanical or electronic security controls would be implemented and active at any given time.

Observations of the Wright station made from public roads adjacent to the Wright station indicated the appearance of minimal staffing and no security guards at the vulnerable perimeters.



Figure 1 – Wright Compressor Station, 320 Westfall Road, Delanson, NY – Arial View

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cont'd



Figure 2 – Wright Compressor Station Entrance



Figure 3 – Wright Compressor Station Perimeter Chain Link Fence

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Since compressor stations can provide relatively insecure housing of equipment used to pressurize a pipeline, the opportunity exists at these sites for terrorists to have time and cover to implement an attack scenario. Once inside a housed facility they could be undiscovered and undisturbed for some time. This raises the possibility for an attack variant that while less infrastructure destructive, would potentially be much more deadly.

Once inside a compressor station and perhaps even after access to a metering station or valve, gaseous and liquid threats could be introduced into the pipeline itself. Once introduced, these materials would then be dispersed and transported the length of the pipeline if introduced in sufficient quantities, relative to their toxicity. The introduced agents could include bio pandemics and/or toxins such as Sarin gas, nerve agents, anthrax and a multitude of other materials. While the ease of, or lack of acquisition and probability of use are much less likely than traditional IEDs, the consequences of loss of life and required clean-up would dwarf a “conventional” IED attack.

In addition, biological or chemical toxins could be transported many miles from the site of introduction and be well distributed even after initial or post detection. The distribution network of natural gas could essentially and theoretically result in the fatality of unsuspecting workers, handlers and possibly even end-users/consumers. While unquestionably theoretical in nature such an attack may indeed be possible. After all, prior to 911 it would have been assumed highly improbable that multiple target(s) attacked through the coordinated efforts of multiple actors could have resulted in the destruction of the World Trade Center towers, partial destruction of the seat of the U.S. military, The Pentagon itself and the associated aircraft used to carry out the attack.

The DEIS lacks any substantive analysis of the myriad of potential terrorist threats to the proposed pipelines within the context of its unique location and operational environment. The omission of such a discussion and the absence of proposed mitigation strategies is a failure of due diligence in a period when the consideration of terrorist threats is a routine and necessary part of any legitimate infrastructure risk assessment.

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It should also be noted that Wright Compressor Station is located on high ground a few miles from the Schoharie Creek.

The road leading to the compressor station is a **designated and posted Evacuation Route** for residents of an area devastated by two recent floods. If the compressor station was to experience a security event it is likely the road leading to it would be shut down. Under such a scenario, area residents would lose an important evacuation route. Such a scenario was not addressed in the DEIS.

3.1.2 Metering Stations

The DEIS identifies multiple proposed metering station sites. The DEIS contains no specific detail of physical and logical security controls designed to mitigate the potential vulnerability of these sites to tampering, compromise or sabotage. Because the DEIS contains no specific details about the components of the proposed metering stations it is impossible for independent subject matter experts to adequately evaluate their susceptibility to malicious exploit.

It is unknown, for instance, if the metering stations will be housed in secure or insecure structures or if they will be accompanied by condensate tanks or the storage of potentially toxic and/or flammable chemicals, such as Methyl Mercaptan or other substances that are commonplace in the industry but that could pose a threat to populations and ecosystems if they were to be deliberately released into the environment.

Since it is likely that the proposed metering stations will have both monitoring and pressure maintaining functions integral to the pipeline and its contents, they represent potential point of failure as well as targets for nefarious actors intent of inducing anomalous conditions into the pipeline in an effort to bring about a negative operational impacts. To that end, the proposed sites of the metering stations represent targets that should be studied and addressed with a documented and validated security and mitigation plan.

A metering station is proposed in close proximity to the Wright Compressor Station. It is proposed for an open field with easy access from a public road. The area is sparsely populated, with few, if any, routine law enforcement patrols.

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Unless stringent security controls were implemented, the level of effort required for undetected and unauthorized access to the metering station would be trivial, with ingress available from multiple directions through open fields and sheltered hedgerows.

The DEIS details no such security controls. The DEIS fails to consider the vulnerability of Wright metering station nor does it consider the vulnerability of the other proposed metering stations or the potential impacts of metering station tampering or sabotage on populations and ecosystems.

3.1.3 Contractor Yards

3.1.3.1 "Spread 5" Contractor Yard in Richmondville, NY

The proposed contractor yard, identified as "Spread 5" in the Town of Richmondville, Schoharie County, is of significant concern. Because of the extensive occurrence of shallow bedrock in the area, Constitution has identified miles of route which may require blasting in order to excavate⁷. Materials necessary for that process, including explosives, are likely to be stored within the Spread 5 and other contractor yards.

It is important to consider the implications of the location of the proposed contractor yard (see Figure 4). The site is adjacent to the primary school bus route for the area's largest school district, it abuts a highway overpass for Interstate 88, is in close proximity to the *Cobleskill-Richmondville High School* and a *National Grid* electrical sub-station.

The proposed contractor yard is also within sight of an interstate Canadian-Pacific railroad line that carries both flammable and toxic chemicals and petroleum products, including Bakken crude oil, which has been a component in several recent catastrophic accidents including an explosion of a train in the middle of the Canadian town of Lac Megantic in July, killing 47 people.⁸

⁷ *Constitution Pipeline Environmental Construction Plan – Construction Activities in New York, Attachment 10-Blasting Plan*, July 2013.

⁸ http://news.yahoo.com/u-rail-rules-not-revamp-old-oil-tank-21311444--finance.html;_ylt=A0LEV0mbZBJTJwA88tXNyoA;_ylu=X3oDMTByaHEyNGMxBHNlYwNzYwRjb2xvA2JmMQR2dGikA1VJQzFfMQ--

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Canadian-Pacific's website states "With direct service and connections with short line railroads in the Bakken Shale region, we are the only rail carrier providing single line haul service between the Bakken and major crude oil markets in the Northeastern United States. Working with companies on both sides of the border, CP is using its proven capabilities in transporting crude oil by rail to deliver product from the Bakken to refineries and other facilities throughout North America."⁹

The proposed location creates opportunities and vectors for malicious/hostile actions wherein explosive materials stored at a facility, and subject to only rudimentary physical security and infrequent law-enforcement patrols, could be purloined and used to cause damage to important state and interstate highway infrastructure, the electrical power grid, nearby rail lines or used to inflict unthinkable and tragic damage to the nearby high-school and/or school buses carrying area students along a route that runs within feet of the proposed contractor yard.

The primary consequences of such activity would be enormous and the secondary externalized psychological, social and economic costs that would be shifted to the communities would be devastating.

The propensity of domestic and international terrorists to select targets that will produce the most psychological impact, such as areas that serve as gathering places for children and other vulnerable populations, has long been known.

Security Expert Bruce Schneier has stated that "militants prefer to attack soft targets where there are large groups of people, that are symbolic and recognizable around the world and that will generate maximum media attention when attacked. Some past examples include the World Trade Center in New York, the Taj Mahal Hotel in Mumbai and the London Underground.

⁹ <http://www.cpr.ca/en/ship-with-cp/where-you-can-ship/bakken-shale/Pages/default.aspx>

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The militants' hope is that if the target meets these criteria, terror magnifiers like the media will help the attackers produce a psychological impact that goes far beyond the immediate attack site a process we refer to as creating vicarious victims."¹⁰

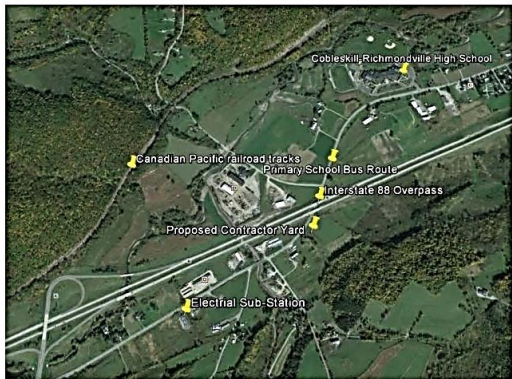


Figure 4 - Proposed Contractor Yard, State Route 7 Richmondville, NY and its proximity To Vulnerable Area Facilities – Arial View.

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3.1.3.2 Spread 4b Contractor Yard in Schenevus, NY

The proposed contractor yard, identified as “Spread 4b” in the Town of Maryland (Schenevus), Otsego County, is also of significant concern because its particular siting creates many of the same opportunities for malicious exploit and disastrous impacts on populations and ecosystems as that of Spread 5.

The proposed Schenevus contractor yard is just .33 of a mile from the Schenevus Central School, fronts the school district’s primary school bus route and is in close proximity to an interchange and overpass of Interstate highway 88 (See Figure 5).

¹⁰ https://www.schneier.com/blog/archives/2011/02/terrorist_targe.html

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Constitution has eliminated contractor yard 4b from its project.

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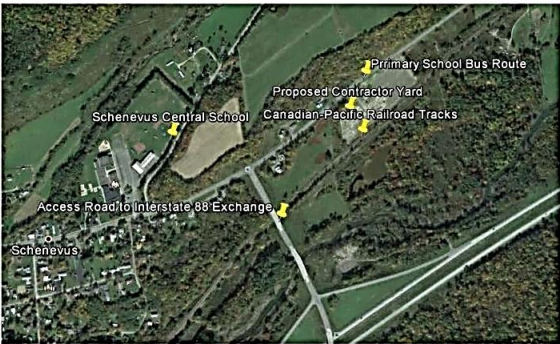


Figure 5 – Proposed Contractor Yard “Spread 4b” in Schenevus, NY and its Proximity to Vulnerable Area facilities – Aerial View

The Proposed Spread 4b contractor station also directly abuts the Canadian Pacific railroad tracks which, as previously stated, are used to ship both flammable and toxic cargo (See Figure 6).



Figure 6 – Proposed Spread 4b Contractor Yard, Schenevus, NY Showing Proximity to Railroad Tracks - Street View

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CO8-4 cont'd	<p>The risk of malicious individuals attempting to exploit materials found in the contractor yard, including explosives used in blasting operations, has not been addressed in the DEIS. Given the proximity of the contractor yard to targets that, if attacked, would result in high-levels of both tangible and psychological impact, this is a serious oversight.</p> <p>The security issues raised above can be extrapolated to the other contractor yards as well because they are located in environments with analogous landscapes and environments. It can therefore be asserted that the susceptibility of all proposed contractor yards to unauthorized access and other exploits that could impact populations and ecosystems has not been adequately addressed by the DEIS.</p>
CO8-5	<p>3.1.4 Malicious Access to Buried Pipe</p> <p>It is also important to note that because of the proposed pipeline’s route through 124 miles of rural communities, vectors for attack are numerous. If a terrorist attack necessitated excavation of a soil-covered section of pipe (which could be as little as 24” because of the extensive areas of shallow bedrock), equipment to perform that excavation is readily available.</p> <p>The proposed contractor yard in Schoharie County, for example, is located within several hundred feet of a commercial construction company whose parking lots are filled with excavating equipment. Excavating activity would draw little attention along much of the proposed route because logging, farming and other machine-heavy operations are commonplace in the rural communities near the proposed route and could provide cover for malicious activity.</p> <p>3.1.5 Threats from the Air</p> <p>The proposed pipeline route is in proximity to multiple private and public airports, including small private fields that have relatively few security controls, presenting the opportunity for attacks executed or facilitated by air.</p>

CO8-5 See the response to comment CO8-3. The Transportation Security Administration has published security guidelines for general aviation airports which can be accessed at: http://www.tsa.gov/sites/default/files/assets/pdf/Intermodal/security_guidelines_for_general_aviation_airports.pdf.

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In In 2002, U.S. officials said they uncovered an al-Qaida plot to fly a small plane into a U.S. warship in the Gulf and in 2003, U.S. officials uncovered an al-Qaida plot to crash an explosives-laden small aircraft into the American consulate in Karachi, Pakistan¹¹.

On September 2, 2011 the FBI and the Department of Homeland Security issued a nationwide warning about potential al Qaeda attacks using small airplanes. The bulletin's stated intent was "to provide federal, state, local, tribal, and private sector partners with new insight into the enduring interest of al-Qa'ida and violent extremists in targeting general aviation, particularly small aircraft."¹²

On January 5, 2002 Charles Bishop, a high-school student at East Lake High School in Tarpon Springs, Florida stole a Cessna 172 from an unattended private airport and crashed it into the side of the Bank of America Tower in downtown Tampa, Florida. The impact killed the teenager and damaged the building.¹³

In April of 2010 a software engineer furious with the Internal Revenue Service (IRS) launched a suicide attack on the agency by crashing his small plane into an office building in Austin, Texas killing himself and an IRS employee.

The pilot took off in a single-engine Piper Cherokee from an airport in Georgetown, about 30 miles from Austin, without filing a flight plan. He flew low over the Austin skyline before plowing into the side the hulking, seven-story, black-glass building.¹⁴

¹¹ http://news.yahoo.com/us-warns-small-airplane-terror-threats-035543236.html;_ylt=A0LEV0pwxAxT4n8A.jlXNyoA;_ylu=X3oDMTEzdThib2hoBHNIYwNzcgRwb3MDMwRjb2xvA2JmMQR2dGika1NNRTMzOV8x

¹² <http://www.eaa.org/news/2011/JIB-GeneralAviation.pdf>

¹³ <http://www.voanews.com/content/a-13-a-2002-01-07-4-plane-67548152/286284.html>

¹⁴ <http://www.foxnews.com/story/2010/02/18/pilot-crashes-into-texas-building-in-apparent-anti-irs-suicide/>

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Schoharie County alone has 7 FAA registered airfields¹⁵, all of which have little or no physical security controls in place (see **Figure 7**) and are within minutes flying time of the pipeline, contractor yards and compressor stations. There are also two heliports in Schoharie County within relative close proximity to the pipeline, the contractor yard and the compressor station.¹⁶

To ignore the possible threats to pipeline infrastructure using easily locally available and easily hijacked small aircraft is antithetical to due diligence and would fail to address the full spectrum of possible threats to the pipeline that could result in severe impacts to populations and ecosystems.



Figure 7 – Hogan Airport (NY05) Esperance, NY

¹⁵ Gar Airport (7NY1) Esperance, NY, Hogan Airport (NY05), Esperance, NY, Schoharie Creek Airport (32nk), Esperance, NY, Blue heron Airport (N25), Gallupville, NY, valley View Airport (7NK0), Middleburgh, NY, Boyes Landing Airport (NK91) Sharon Springs, NY and Sharon Airport (K31) Sharon Springs, NY.

¹⁶ TGP-249 Heliport (1NY6) Carlisle, NY and B-G Heliport (3NK7) Gilboa, NY.

COMPANIES AND ORGANIZATIONS

CO8– Center for Sustainable Rural Communities

CO8-6

3.1.6 Access to Pipelines Infrastructure via All-Terrain Vehicles (ATV) and Snow Mobiles

Similarly, all-terrain vehicle and snowmobile activity is ubiquitous throughout the areas through which the pipeline is proposed and is facilitated by an extensive systems of designated and ad-hoc trails through even the most remote forest areas (see Figure 8), allowing for unchallenged access to even the most remote sections of the proposed pipeline route.



Figure 8 – Snowmobile trail in Summit, NY near the proposed route of the Constitution Pipeline.

Notable is extensive snowmobile activity in proximity to the Wright Compressor Station. The route of the existing Pipeline which connects to the Wright Compressor Station is clearly marked and unsecured (See Figure 9). In fact, the clear cut right-of-way appears to be used as a snow mobile trail by area residents. It is conceivable that such unfettered winter access to area pipelines, and potentially the Wright Compressor Station, could be easily utilized by malicious individuals for access to critical pipeline infrastructure in order to facilitate physical attacks on that infrastructure.

CO8-6

The comments regarding threats posed by snowmobile and all-terrain vehicle access are noted. See the response to comment CO8-3. Constitution would coordinate restricting unauthorized access of ATVs and snowmobiles with the appropriate landowners and install suitable barriers (typically rock, timber, or gates) if necessary.

COMPANIES AND ORGANIZATIONS

CO8 – Center for Sustainable Rural Communities (cont'd)

CO8-6
cont'd



Figure 9—Tracks Indicating Extensive Snowmobile Activity near the Wright Compressor Station

CO8-7

3.2 Cyber-Attacks on Pipeline Control Systems

The potential for cyber-attacks on pipeline control devices and sensors is also viable and problematic. In 2005, the *Institute for Information Infrastructure Protection* stated that “Although the terrorist attacks on the oil and gas sector are a relatively small proportion of terrorist attacks overall, the data show that a significant number of attacks have occurred over the period 1990-2005. The number of attacks on the sector appears to be increasing in some countries.

Although these are physical attacks rather than SCADA (Supervisory Control and Data Acquisition) attacks, the data suggest that the sector is vulnerable. If terrorist groups feel that carrying out a physical attack within the United States is too difficult they could turn their attention to other vulnerabilities such as SCADA systems.”¹⁷

In October 2005 the *US House of Representatives Committee on Homeland Security* issued a document entitled *SCADA Systems and The Terrorist Threat: Protecting The Nation’s Critical Systems Joint Hearing before The Subcommittee On Economic Security, Infrastructure Protection and Cybersecurity*¹⁸ which said, in part: “[t]errorists could

¹⁷ *Trends for Oil and Gas Terrorist Attacks*, the Institute for Information Infrastructure Protection, Research Report Number 2, November, 2005.

¹⁸ http://www.fas.org/irp/congress/2005_hr/scada.pdf

CO8-7

The comments regarding threats posed by cyber and social engineering attacks are noted. See the response to comment CO8-3.

COMPANIES AND ORGANIZATIONS

CO8 – Center for Sustainable Rural Communities (cont'd)

CO8-7
cont'd

utilize SCADA systems for their own sinister motives—**causing a pipeline to burst**, opening flood gates on dams, or shutting down our electric supply, all without ever gaining access to the facility. “

The US Department of Homeland Security (DHS) stated in May of 2012 that “[f]or the past six months, an unidentified group of hackers has been mounting an ongoing, coordinated cyber-attack on the control systems of U.S. gas pipelines, prompting the DHS to issue alerts. The hackers are using a technique called spear-phishing, in hopes of stealing passwords and gaining access to the pipelines' control systems.”¹⁹

In response the DHS report Joseph Weiss, managing partner for the security firm *Applied Control Solutions*, said the latest attacks highlight the vulnerability of critical infrastructure systems. He said control systems vulnerabilities can be found in the electrical grid, water utilities and others as well as pipeline operators. “Once you get to those systems, really bad things happen,” he said. “That’s where people die.”²⁰

The DEIS issued by the FERC does not address the potential impacts on populations and ecosystems resulting from a cyber-compromise of pipeline SCADA systems. The range of exploits that could be executed against the SCADA systems associated with the proposed Constitution Pipeline are nearly limitless and can only be mitigated by a comprehensive information security framework defined, implemented and administered in a manner consistent with best practice standards within the context of the proposed pipeline’s unique operational environment.

There is no indication in the DEIS that such a framework has been identified, documented or validated nor is there a defined plan for doing so in the future. The consequence of that omission is an inability to state with any certainty if the SCADA systems controlling the reliability and safety of the proposed pipeline will be adequate to ensure the integrity of the pipeline and the safety of the host communities.

¹⁹ <http://abcnews.go.com/Blotter/dhs-hackers-mounting-organized-cyber-attack-us-gas/story?id=16304818>

²⁰ <http://www.defencetalk.com/us-probing-cyber-attacks-on-gas-pipelines-42383/#ixzz2svm15l00>

COMPANIES AND ORGANIZATIONS

CO8 – Center for Sustainable Rural Communities (cont'd)

CO8-7
cont'd

3.3 Social Engineering Attacks

If approved and built, the integrity and safety of the proposed Constitution Pipeline will be a consequence of the aggregate controls, policies, procedures and protections implemented. Those controls, policies, procedures and protections will be designed, installed, administered and maintained by pipeline employees and contractors.

As with all organizations, Constitution's staff represents both its most important operational asset and its largest vulnerability.

Social engineering attacks intended to leverage the tendency of personnel to be trusting, helpful but often untrained in identifying social engineering exploits are commonplace and unfortunately, often successful.

The goal of such attacks is usually to gain unauthorized access to facilities and control systems for the purpose of sabotage or compromise.

In 2012 The *Industrial Control Systems Cyber Emergency Response Team* (ICS-CERT), which is part of the *U.S. Department of Homeland Security*, issued an alert to warn of ongoing cyber-attacks against the computer networks of U.S. natural gas pipeline companies. The ICS-CERT alert states that the campaign involves narrowly focused **spear-phishing scams targeting employees of the pipeline companies** with carefully crafted but fraudulent emails to which the employees responded with critical information including accounts and password information.²¹

Key information regarding vulnerabilities in Supervisory Control and Data Acquisition (SCADA) systems is also openly available from a range of sources on the public Internet, according to a report entitled *Using Open Source Intelligence to Improve ICS & SCADA Security* issued by engineering consulting firm *Atkins*, which was presented as part of the *Institution of Engineering and Technology* seminar on February 6, 2014 in London. The investigation discovered that many industrial sector websites and academic papers, for example, also provide some information about potential attack vectors, including the identification of engineering staff, their social media information used to corroborate control systems data, and their **suitability for social engineering attempts**.

A report entitled *The Risk of Social Engineering on Information Security: A survey of IT Professionals*²², issued by Dimensional Research in September of 2011, states that 86% of all IT professionals surveyed are aware or highly aware of this potential threat of social engineering attacks.

²¹ <http://blogs.csoonline.com/critical-infrastructure/2165/ics-cert-alert-natural-gas-pipelines-under-attack>

²² <http://www.checkpoint.com/press/downloads/social-engineering-survey.pdf>

COMPANIES AND ORGANIZATIONS

CO8 – Center for Sustainable Rural Communities (cont'd)

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CO8-7 cont'd	<p>43% know they have been targeted by social engineering schemes. New employees (60%), contractors (44%), and executive assistants (38%) are cited to be at high risk for social engineering.</p> <p>The November 2011 issue of <i>Information Week</i> contained a story in which the scope of the social engineering threat was placed into perspective. The author stated: "[t]he number-one advanced persistent threat (APT) attack vector is now not technology, but social engineering."²³</p> <p>My two decade professional experience in conducting social engineering vulnerability assessments has been consistent and conclusive: social engineering attacks, whose goal is unauthorized physical access, unauthorized logical access or simply sabotage, are commonplace and unfortunately often effective because of a lack of defined and documented policies and procedures and insufficient or non-existent training of employees, vendors and contractors.</p> <p>The DEIS issued by the FERC did not address the susceptibility of the proposed Constitution Pipeline to social engineering attacks whose ultimate purpose could range from compromise of SCADA systems to sabotage, nor did it address the pipeline owners' policies, procedures or personnel awareness training requirements intended to mitigate the threat of social engineering attacks.</p> <p>Given that such attacks are possible and plausible throughout the construction, operation/administration and maintenance phases of the proposed pipeline project, this omission is substantive and troubling.</p>
CO8-8	<p>4.0 Conclusion</p> <p>The DEIS issued by the FERC is incomplete. It does not address, in any substantive way, physical and cyber-security threats to the proposed Constitution Pipeline. It does not address such threats as a possible cause for a myriad of impacts on populations and ecosystems. It does not address the economic, social and psychological costs to the communities through which the pipeline is proposed to run if physical or cyber-attacks were to occur, particularly the externalized costs that would be borne by the communities rather than the pipeline's owners.</p> <p>²³ http://www.informationweek.com/security/vulnerabilities-and-threats/social-engineering-leads-apt-attack-vectors/d/d-id/1100142</p> <p>22</p>

CO8-8 The FERC's Office of Energy Infrastructure Security conducts outreach directly with private sector infrastructure owners; users and operators of energy delivery systems regarding identification, communication and mitigation of cyber and physical threats to FERC-jurisdictional energy facilities. Divulging specifics of the mitigation measures could compromise their effectiveness and is beyond the scope of this EIS. See the responses to comment FA1-1 (regarding adequacy of the EIS) and CO8-3 (regarding discussion of security measures in the EIS).

COMPANIES AND ORGANIZATIONS

CO8 – Center for Sustainable Rural Communities (cont'd)

CO8-8
cont'd

It does not address Constitution's compliance or non-compliance with best practice standards to mitigate the risks associated with physical, cyber-attacks and social engineering attacks against its infrastructure and it does not examine the potential vulnerability of the proposed pipeline to a range of physical and cyber-attacks along its full length, varied operating environments and landscapes and involving a large number of personnel with varying skill sets and training.

Of the 945 pages of information contained in the DEIS **only three short paragraphs reference the issue of terrorism** and those paragraphs contain no reference to any specific policies, procedures, controls or strategies to be implemented by Constitution to address the threat of physical or cyber-attacks against the pipeline and its associated infrastructure and controls. The document contains no specific discussion of security challenges in remote rural environments and no discussion of challenges of law enforcement oversight or response in communities without a police force.

The only security-specific controls referenced in the entire document appear to be chain link fences near above-ground facilities. **The absence of a comprehensive discussion of the threat to the pipeline, landowners and communities as a result of physical and cyber-attacks is startling.**

The following comment is included in the DEIS as part of the conclusion of the short section on terrorism: "The likelihood of future acts of terrorism or sabotage occurring at the proposed facilities, or at any of the myriad of natural gas pipelines or facilities across the United States, is unpredictable given the disparate motives and abilities of terrorist groups."²⁴

Such a statement made without a commitment to specific mitigation requirements is cavalier, irresponsible and alarming to citizens who are being told that they must live in proximity to this proposed pipeline and communities who may shoulder many of the externalized costs in the wake of a physical or cyber-attack. It also casts doubt on the thoroughness of the DEIS in regards to impacts on populations and ecosystems resulting from deliberate acts of sabotage against the pipeline.

If the FERC were to ignore the potential physical and cyber-threats to this pipeline it would be abdicating its responsibility as defined by the Office of Energy Infrastructure Security (OEIS) to develop "recommendations for identifying, communicating and mitigating potential cyber and physical security threats and vulnerabilities to FERC-jurisdictional energy facilities using the Commission's existing statutory authority."²⁵

²⁴ DEIS page 4-201

²⁵ <http://www.ferc.gov/about/offices/oeis.asp>

COMPANIES AND ORGANIZATIONS

CO8 – Center for Sustainable Rural Communities (cont'd)

S-232

CO8-8
cont'd

In light of the complex threats and countermeasures environment detailed in this document, concern for the health and safety of the residents along the proposed pipeline route, the potential externalized costs associated with a physical or cyber-attack against the proposed pipeline, the broader national security of the United States and the stated commitment of the FERC to addressing cyber and physical threats to our nation's energy infrastructure, I respectfully ask the (FERC) to act with due diligence and an abundance of caution and **withdraw the DEIS** until such time as a revised DEIS can be issued that contains the following critical information:

- The input on, and assessment of, physical and cyber-security threats specific to the proposed Constitution Pipeline, by the US Department of Homeland Security, The New York State Department of Homeland Security and the Transportation Safety Administration.
- The documented results of a systematic risk assessment defining the potential physical and cyber-security threats to the proposed Constitution Pipeline and specific mitigation actions that will be taken to address those threats, **using a quantitative and qualitative risk assessment methodology consistent with best practice standards**, including but not limited to:
 - *API Security Vulnerability Assessment Methodology for the Petroleum and Petrochemical Industries.*
 - *National Institute of Standards and Technology (NIST), Special Publication 800-30, Revision 1 - Guide for Conducting Risk Assessments.*
- An action plan to address the specific vulnerabilities of the proposed Constitution Pipeline, to physical attack by individual and state-sponsored terrorists, both domestic and foreign.
- An action plan to address the specific vulnerabilities of the proposed Constitution Pipeline and its control systems to cyber-attacks from individual and state-sponsored terrorists, both domestic and foreign.
- Evidence that the builders and operators of the proposed constitution pipeline have identified, documented and implemented a physical security framework that is consistent with best practice standards, including but not limited to:

COMPANIES AND ORGANIZATIONS

CO8 – Center for Sustainable Rural Communities (cont'd)

CO8-8
cont'd

- *TSA Pipeline Security Guidelines*
 - *TSA National Terrorism Advisory System (NTAS) Threat Level Protective Measures Supplement to the TSA Pipeline Security Guidelines.*
- Documented evidence that the builders and operators of the proposed constitution pipeline have identified, documented and implemented a cyber-security framework that is consistent with best practice standards, including but not limited to:
 - *ISO/IEC 27001:2005 - Information Technology - Security Techniques - Information Security Management Systems – Requirements*
 - *ISO/IEC 27002:2005 - Information Technology - Security Techniques - Code of Practice for Information Security Management.*
 - *API 1164 - SCADA Security*
 - *ISA SP99 - Industrial Automation and Control Systems Security*
 - *National SCADA Test Bed - A Summary of Control System Security Standards Activities in the Energy Sector*
- Documented Evidence that those responsible for the construction, operation, administration, maintenance and security of the proposed pipeline have documented policies and procedures in place to address social engineering attacks against the pipeline infrastructure and have adequately socialized and trained personnel to conduct operations in a manner consistent with those policies and procedures.
- Data extracted from the *FBI Bomb Data Reports*, since September 11, 2001, that shows the frequency of both suspected and validated threats to pipelines or related infrastructure by IED driven events and the potential for such clandestine activity to occur along the proposed Constitution Pipeline route.
- A comprehensive and documented projection of the potential public health, environmental, economic and social impacts of a terrorist induced pipeline event on the populations and eco-systems in proximity to the proposed Constitution Pipeline resulting from explosion, fire, toxic emissions, damage to transportation infrastructures, disruptions of economic systems or other consequences.

COMPANIES AND ORGANIZATIONS

CO8 – Center for Sustainable Rural Communities (cont’d)

CO8-8
cont'd

Projections should clearly distinguish between costs that would be borne by the pipeline owner(s) and the costs that would be externalized to individual landowners, host communities and taxpayer funded government agencies as well as non-profits providing services to those communities.

Respectfully submitted by:

The Center for Sustainable Rural Communities
Robert Nied
Don Airey

COMPANIES AND ORGANIZATIONS

CO9– Kernan Land Trust



The Henry S. Kernan Land Trust & The Charlotte Forest PO 317 / County Highway 40 / Worcester NY / 12197
Trustees: H. Devereux Kernan / Catherine S. Kernan / Bruce D. S. Kernan / Christopher N. Kernan / Patricia McC. Kernan

SENT VIA ELECTRONIC FILING

Reference: DEIS Executive Summary page ES-5

OEP/DG2E/Gas 4
Constitution Pipeline Company, LLC
Constitution Pipeline Project
Iroquois Gas Transmission System, L.P.
Wright Interconnect Project
Docket Nos. CP13-499-000
CP13-502-000

Ms. Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
Washington DC 20426
Re: Docket No. CP13-499-000
Constitution Pipeline

cc. US Army Corps of Engineers
The FERC New York District, CENAN-OP-R
888 First Street NE, Room 1A Upstate Regulatory Field Office
Washington, D.C. 20426 1 Buffington Street, Bldg. 10, 3rd Floor

Dear Ms. Bose:

CO9-1 I submit following two comments on the following section of the DEIS (page ES-5):

“To minimize impacts on interior forest which would account for 439.7 acres during construction and 217.9 acres during operations, Constitution would reduce the proposed construction right-of-way from 110-feet-wide to 100-feet-wide feet, where feasible, avoiding impacts on approximately 52 acres of forestlands (forested areas would be subject to 50-footwide permanent easement). To further mitigate impacts from fragmentation, we are recommending that Constitution develop an Upland Forest Mitigation Plan developed in consultation with the applicable federal and state agencies to minimize forest impacts.”

CO9-1 As discussed in section 4.5 of the EIS a reduction of the construction right-of-way width from 110 feet to 100 feet would avoid forest clearing of 52 acres. Therefore, while these forested tracts would still be fragmented, direct impacts on interior forests would be reduced by 52 acres due to the reduction in construction right-of-way width.

COMPANIES AND ORGANIZATIONS

CO9 – Kernan Land Trust (cont’d)

CO9-1 cont.	Comment 1: The DEIS provides no scientific evidence that reducing the proposed construction right-of-way by 10 feet will “minimize impacts on interior forest”. Based on my professional education in forest science and 35 years of experience as a professional forester, this I think this conclusion highly unwarranted. I request that FERC provide the scientific basis it used to come to this conclusion so that I can evaluate the conclusion on the basis of scientific evidence.
CO9-2	Comment 2: The FERC requests that Constitution develop an Upland Forest Mitigation Plan to minimize forest impacts. FERC therefore considers the DEIS to be incomplete in its evaluation of the effects of the pipeline on interior forests. It is not possible for me to comment adequately on an incomplete DEIS. I request, therefore, that FERC re-submit the DEIS for public comment once Constitution has prepared and presented the Upland Forest Mitigation Plan. Otherwise, I will be deprived of my right to evaluate and comment on this important section of the DEIS. Sincerely, Bruce S. Kernan

CO9-2

As stated in section 5.2 of the draft EIS, the FERC recommended that Constitution file a draft upland forest mitigation plan prior to the end of the draft EIS comment period. This plan was filed by Constitution on May 6, 2014
http://elibrary.ferc.gov/0/idmws/file_list.asp?document_id=14213683. Several months have elapsed since the filing of this plan and the issuance of this final EIS, during which, the public has had an opportunity to comment on the plan. As discussed in the response to comment FA1-1, the FERC continued to accept comments on the draft EIS, the Preliminary Migratory Bird and Upland Forest Plan, and any other materials placed into the record past the end date of the comment period and up to the point of publication of the final EIS. Any comments received after the end of the comment period were considered in preparation of the final EIS.

COMPANIES AND ORGANIZATIONS

CO10 – Center for Sustainable Rural Communities

S-237

Center for Sustainable Rural Communities
PO Box 193
Richmondville, New York 12149

March 20, 2014

Ms. Kimberly D. Bose
Secretary
Federal Energy Regulatory Commission
888 First Street, NE
Washington, D.C. 20426

This letter also contained
an addendum regarding
hydrofracturing concerns. This
document can be viewed at:
[http://elibrary.ferc.gov:0/
idmws/file_list.asp?
document_id=14196150](http://elibrary.ferc.gov:0/idmws/file_list.asp?document_id=14196150).

Us Army Corps of Engineers
New York District CENAN-OP-R
Upstate Regulatory Field Office
1 Buffington Street, Bldg. 10, 3rd Floor
Watervliet, New York 12189-4000

RE: Docket Nos. CP13-499 and CP13-502, NAN-2012-00449-UBR

CO10-1 | **Comment: The Importance of Considering the Build Out of Hydraulic Fracturing Infrastructure Following the Construction of the Proposed Constitution Pipeline and the Potential Impacts of that Build Out on a Fragile Karst Topology.**

The Center for Sustainable Rural Communities (CSRC) is a 501 (C)3 non-profit New York Corporation that advocates for vibrant, livable and sustainable rural communities in Upstate, New York. CSRC encourages environmentally-compatible economic development, access to arts and technology and progressive community and land-use planning while working to preserve the rural character and ecological and cultural diversity of the region.

The CSRC, an Intervener on the matter of the proposed Constitution Pipeline (Docket No. 13-499), agrees with the position of the *New York State Department of Environmental Conservation (DEC)* that no assessment of the potential environmental impacts of the proposed Constitution Pipeline would be complete without a consideration of the potential build out of hydraulic fracturing infrastructure in response to the construction of that Pipeline.

It is reasonable and prudent to assume such a build out is not only possible, given the pipeline's proximity to Utica shale deposits noted and documented by the US Geological Service, but also likely given ever increasing market and political pressures to leverage domestic shale gas reserves. Additionally, the New York State Environmental Quality Review Act (SEQRA) requires that all phases of a project be considered when evaluating potential environmental impacts.

CO10-1 See the responses to comments LA1-4 and CO3-1.

COMPANIES AND ORGANIZATIONS

CO10 – Center for Sustainable Rural Communities (cont’d)

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CO10-1
cont.

Given the relationship between natural gas transmission infrastructure and natural gas extraction infrastructure it would also be reasonable to assume that if and when high volume horizontal hydraulic fracturing is permitted in NY State such activity will be concentrated in proximity to transmission facilities.

If hydraulic fracturing activity, facilitated and encouraged by the proposed Constitution Pipeline, does occur in the vicinity of the pipeline it will occur in a uniquely sensitive and vulnerable Karst geological topology. The permeability, geological fragility, large contiguous aquifers, erratic hydrology, cave systems and bat populations associated with Karst formations are especially susceptible to the intensive and highly invasive process of high volume horizontal hydraulic fracturing.

FERC’s Draft Environmental Impact Statement (DEIS) fails to both consider the potential build out of hydraulic fracturing activity and infrastructure in response to the construction of the proposed pipeline and the impacts of that build out on a fragile Karst topology.

We are submitting a comprehensive study of the impacts of hydraulic fracturing on Karst regions completed by Arthur N. Palmer, Professor Emeritus, SUNY-Oneonta and Paul Rubin, Hydrologist and Principal with Hydroquest, as **Addendum I** to this comment. The study focuses on the Cobleskill Plateau, an area particularly relevant to the proposed pipeline route.

We respectfully request that FERC develop a Supplemental EIS that includes an analysis of the potential build out of hydraulic fracturing activity and infrastructure in response to the construction of the proposed Constitution Pipeline and the potential impacts of that build out on the region’s fragile Karst topology. We further request that the supplemental information specifically address the findings of, and the concerns raised by, Professor Palmer and Mr. Rubin.

Thank you.

Robert Nied
Board of Directors
Center for Sustainable Rural Communities

COMPANIES AND ORGANIZATIONS

CO11 – Earthjustice



ALASKA CALIFORNIA FLORIDA MID-PACIFIC NORTHEAST NORTHERN ROCKIES
NORTHWEST ROCKY MOUNTAIN WASHINGTON, D.C. INTERNATIONAL

March 25, 2014

Via Electronic Filing: efiling@ferc.gov
Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
888 First Street, NE
Washington, DC 20426

Re: Request for Extension of Time for Public Comment on Draft Environmental Impact Statement for Constitution Pipeline and Wright Interconnect Projects, Docket Nos. CP13-499-000 and CP13-502-000

Dear Ms. Bose:

CO11-1

On behalf of intervenors Catskill Mountainkeeper, Clean Air Council, Delaware-Otsego Audubon Society, Delaware Riverkeeper Network, Riverkeeper, Inc., and Sierra Club ("Intervenors"), we urge the Federal Energy Regulatory Commission (the "Commission") to extend the period of time during which it will accept comments by the public on the Draft Environmental Impact Statement ("DEIS") for the proposed Constitution Pipeline and Wright Interconnect Projects. Specifically, Intervenors echo the request submitted by the New York State Department of Environmental Conservation yesterday (docket accession no. 20140324-5129) that calls for an extension of the close of the public comment period until May 30, 2014. Intervenors agree with the Department that the public cannot evaluate and all of the impacts of the proposed projects without a more full disclosure of those impacts by the Projects' proponents and cannot offer meaningful comments without additional time to review the voluminous DEIS and the supplemental studies, analyses, descriptions of impacts, and plans for mitigation of impacts that the Commission has requested from the Projects' proponents. Intervenors, therefore, urge the Commission to grant their and the Department's requests for an extension of the public comment period and to notify the parties to the above-referenced proceedings of the Commission's grant or denial of these requests by Friday, March 28, 2014.

Respectfully submitted,

A handwritten signature in black ink, appearing to read "Bridget Lee", is written over a light blue rectangular stamp.

Bridget Lee

*Counsel for Catskill Mountainkeeper, Clean Air Council,
Delaware-Otsego Audubon Society, Delaware Riverkeeper Network,
Riverkeeper, Inc., and Sierra Club*

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CO11-1

See the response to comments FA1-1 and CO9-2.

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COMPANIES AND ORGANIZATIONS

CO12 – Hudson Highlands Environmental Consulting

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**Hudson Highlands
Environmental
Consulting**

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Warwick, N.Y. 10990
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(845) 986-5350
FAX (845) 986-9492
E-mail highlands144@gmail.com

March 24, 2014

Ms. Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
888 First Street NE, Room 1A
Washington DC 20426

RE: Constitution Pipeline Project DEIS
Docket No. CP13-499-000

Dear Ms. Bose:

CO12-1 I represent The Henry S. Kernan Land Trust, which manages protected land that would be impacted by a full mile of the proposed Constitution Pipeline that would cross the land. I am writing with great concern regarding the incomplete state of the Draft Environmental Impact Statement (DEIS) that I believe has been prematurely released for public review.

"So inadequate as to preclude meaningful analysis"

When in graduate school at Indiana University in 1979, I studied directly under the architect of the 1969 National Environmental Policy Act (NEPA), Lynton K. Caldwell. Since that time, as a professional, I have amassed more than 30 years of experience in the preparation and review of environmental impact statements. I am therefore quite familiar with the requirements and standards for the preparation of an environmental Impact statement.

CEQ regulations governing the preparation of environmental impact statements state *"The draft statement must fulfill and satisfy to the fullest extent possible the requirements established for final statements in section 102(2)(C) of the Act. If a draft statement is so inadequate as to preclude meaningful analysis, the agency shall prepare and circulate a revised draft of the appropriate portion. The agency shall make every effort to disclose and discuss at appropriate points in the draft statement all major points of view on the environmental impacts of the alternatives including the proposed action."* (40 CFR Part 1502.9 (a))

The environmental impact statement for the referenced action seriously fails to meet this standard. This becomes immediately apparent in just reading the executive summary, in which FERC asks the project sponsor for a laundry list of missing information and reports. These include:

- a formal slope stability analysis
- geotechnical feasibility studies for all trenchless crossing locations
- the location of all water wells and springs within 150 feet
- a description of impacts and any proposed impact avoidance, minimization, and mitigation measures for each waterbody that would be impacted by workspaces but not crossed by the pipeline

CO12-1 See the response to comment FA1-1.

COMPANIES AND ORGANIZATIONS

CO12 – Hudson Highlands Environmental Consulting (cont'd)

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Ms. Kimberly D. Bose
March 24, 2014

CO12-1
cont'd

- site-specific plans for the permanent access road crossings in wetlands and associated waterbodies, including site-specific justifications for the use of permanent fill
- an upland forest mitigation plan
- completion of required bald eagle surveys, development of mitigation for nests that may be close to areas requiring blasting, and a finalized bald eagle mitigation plan
- written approval from the NYSDEC allowing water withdrawals
- mitigation for special-status bat species
- remaining surveys for state-listed species
- classification of currently unsurveyed structures
- a site-specific noise mitigation plan
- additional information and analysis on 13 minor route alternatives that they note could reduce impacts on sensitive resources.

We can add further to that list. Most notably, the Army Corps of Engineers has advised that they still will require the completion of in-field wetland delineations for the entire route before they consider the federal wetlands application complete.

FERC has asked that Constitution provide the missing information by the end of the comment period. However, that necessarily means that the none of the lacking information will be available for public review before the comment period closes. This includes pertinent information that is critical to my review on behalf of my clients, as I will discuss below. If FERC has determined that this information is necessary for their review, the same would be true of the public's review. By requiring the information to only be supplied by the end of the comment period, the public will be denied their right to review a complete document. It is my professional belief that the lacking information is so significant that it does indeed render the document to be so inadequate as to preclude meaningful analysis. In accordance with CEQ regulations, FERC therefore must, after being in receipt of the missing information, prepare and circulate a revised draft and keep the comment period open for an appropriate period from that point. I feel that an appropriate period would be 45 days from the point that the draft environmental impact statement is finally considered to be complete.

CO12-2

The structure of the DEIS also contributes to its inadequacy

In addition to the missing information, the DEIS also only makes reference to information in ways that do not allow the public to locate and review the referenced information, nor to understand it. For example, the Kernan Land Trust provided several potential routing alternatives that would allow the pipeline to avoid critical environmental resources on its land and adjacent properties. At least two of these routes were submitted with a detailed analysis comparing the impact of the routes to the preferred route. There is no analysis of these routes at all in the Alternatives section of the DEIS, and only cryptic references in tables in Appendix H. On page H-7, in a table labeled "Status of Minor Route Variations Reported to Constitution", these notes are found for alternatives in the general vicinity of the Kernan Land Trust property:

"(Mile) 90.0

This deviation was developed to avoid forested land.

Hudson Highlands Environmental Consulting 71 Colonial Avenue, Warwick, NY 10990 (845) 986-5350

Page 2

CO12-2

See the response to CO4-2. Appendix H-2 has been revised to further clarify and present information provided since the draft EIS.

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COMPANIES AND ORGANIZATIONS

CO12 – Hudson Highlands Environmental Consulting (cont'd)

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Ms. Kimberly D. Bose
March 24, 2014

CO12-2
cont'd

This route deviation was not adopted. Constitution determined that re-route affects several new landowners to avoid one landowner. The route adds several additional turns and is not the most favorable route. This reroute is also close to a cemetery at Titus Lake Rd. crossing. It also parallels propane line that has had issues in the past."

(Mile) 90.8

This deviation was developed to avoid sensitive land features.

This route deviation was not adopted. Determined that re-route would impact 26 new landowners if implemented."

Then, later on page H2-5, in a table labeled "Status of Minor Route Variations Reported by Stakeholders", there is this note:

(Mile) 90.8

This deviation was developed to avoid forested land.

This route deviation was not adopted. Constitution reviewed five proposed reroutes for this property submitted through the landowner and/or FERC. The proposed re-routes were not adopted for various reasons including:

1) the re-route followed a propane line with documented safety issues, added too many points of inflection to the line, and was located too close to a cemetery; 2) the re-route increased impact area on the property and located the pipeline through a wetland; 3) the re-route increased impact area on the property and included 90 degree angles that posed constructability issues; 4) the re-route followed the same propane line noted above and impacted 13 landowners versus 2 landowners; and 5) the re-route impacted 26 new landowners versus the one landowner of the subject property."

This is the entirety of analysis and response to five carefully developed alternative routes that were submitted to Constitution over an expanded period of time. The purported reasons for the rejection of these alternative routes is lumped together, with not even an indication of what reason applies to which proposed alternative route. In the same sentence, a confusing rejection of "the reroute" includes that it impacted 13 landowners versus 2 landowners, *and* that it impacted 26 landowners versus one landowner.

Any attempt to do a meaningful analysis by correlating the information provided in the DEIS with the individual alternatives proposed by the Kernan Land Trust fails. For instance, two alternatives were proposed that would collocate the pipeline with a portion of a propane gas pipeline, but these alternatives deviated from the preferred route at Mile 90.3, not 90.0 nor 90.8. Plus the analysis we provided for those alternatives demonstrated that they reduced the number of landowners affected by a new easement on their property from 15 to 12 in one case, and from 15 to 7 in the other. The assertion in the DEIS that a proposed re-route following the propane line would increase the impacted landowners from 2 to 13 therefore seems to make no sense, but without either a basis or analysis provided for that conclusion, nor even any attempt to identify which alternative the statement applies to, we are completely precluded any ability to conduct any meaningful analysis and to provide any substantive comment.

Hudson Highlands Environmental Consulting 71 Colonial Avenue, Warwick, NY 10990 (845) 986-5350

COMPANIES AND ORGANIZATIONS

CO12 – Hudson Highlands Environmental Consulting (cont'd)

20140326-5112 FERC PDF (Unofficial) 3/26/2014 2:46:43 PM

Ms. Kimberly D. Bose
March 24, 2014

CO12-3 Another example is the generalized, cryptic, and unsubstantiated statement, "*It also parallels propane line that has had issues in the past.*" Again, no explanation is provided to the nature of the "issues", nor how this may affect the use of the existing easement as an alternative route. I personally placed a telephone call to FERC staff to request direction as to where I could find more information regarding the concerns about the propane gas pipeline easement. I was told that it would be somewhere in the docket, and when I asked more specifically where it might be located, I was told that it could be anywhere, but possibly within comments that were received from outside parties. Given the enormity of the docket, I pleaded for some more direction or assistance in locating this information so that I might be able to understand the point being made in the DEIS, and therefore be able to respond to it intelligently. I was told that it would take "a couple of days", but that I'd receive a phone call in response. After the passage of a month, and repeated messages left on voicemail, I am still without an answer on just this one point, much less a multitude of other questions that are a direct consequence of the inadequacy of the DEIS.

Conclusion

CO12-4 It is my professional belief that the issues discussed above render the DEIS woefully incomplete and inadequate for meaningful review by either the public or cooperating agencies. The examples given are representative of issues that pervade the entire document. Throughout the DEIS, conclusions are stated without substantiation or a basis in any demonstrated analysis. Cryptic references are made to information that cannot be found. NEPA was intended to provide a logical, comprehensive system through which the environmental impact of a proposed action can be assessed. It was meant to serve both government agencies as decision makers, and also the public as stakeholders. An EIS must be accessible to everyone. It must be understandable and easy to navigate. It's not acceptable that someone would have to wade through a mountain of files in a docket to find a piece of buried information. It's not acceptable that conclusions are drawn without providing a basis for the conclusion. It's not acceptable that references are cryptic, and not able to be clearly found and examined.

For all these reasons, FERC must revise this DEIS in accordance with CEQ regulations, and hold comments open for the minimum 45-day period from the date of re-circulation.

Thank you for your consideration.

Respectfully submitted,



Stephen M. Gross
Principal
Hudson Highlands Environmental Consulting

cc: US Army Corps of Engineers, New York District, CENAN-OP-R
B. Kernan, Henry S. Kernan Land Trust

Hudson Highlands Environmental Consulting 71 Colonial Avenue, Warwick, NY 10990 (845) 986-5350

Page 4

CO12-3

Section 3.4.3 and Appendix H-1 of the EIS has been revised to provide additional details and references for the statements made regarding the propane line. The FERC staff followed up and provided the requested information to the commentor.

CO12-4

The commentor's statements regarding the adequacy of the draft EIS are noted. See the response to comment FA1-1.

S-243

COMPANIES AND ORGANIZATIONS

CO13 – Delaware-Otsego Audubon Society, Inc.

20140327-5014 FERC PDF (Unofficial) 3/27/2014 7:33:30 AM



DELAWARE-OTSEGO AUDUBON SOCIETY, INC.

P.O. Box 544, ONEONTA, NY 13820

Federal Energy Regulatory Commission
Washington, DC

March 27, 2014

CO13-1

I am submitting these comments on the Constitution Pipeline and Wright Interconnect Projects Draft Environmental Impact Statement on behalf of the Delaware-Otsego Audubon Soc. Our organization had earlier provided comments on The Environmental Report for the Federal Energy Regulatory Commission application for the Constitutional Pipeline as part of a larger submission by Earthjustice.

In our submission, we raised concerns over large blocks of relatively unbroken forest habitat that will be fragmented by the pipeline right of way, and the negative impacts this will have on interior forest birds. Much of the route of the pipeline passes through mature or near-mature forest. The DEIS documents that the right-of-way will fragment 36 miles of interior forest. Construction of the pipeline will be the largest single act of forest fragmentation in the region. A review of the maps of the pipeline route indicates it follows ridge tops in many areas, and crosses steep slopes in others. These areas targeted for the pipeline are largely undisturbed woodland due to elevation and inaccessibility. Most flatter and lower land in the region has already been deforested for agriculture and other development. The forests to be bisected by the right-of-way are the last remaining large forest tracts in the area in many cases. The pipeline corridor will affect over 300 interior forested tracts.

We documented in our earlier submission that this sort of fragmentation has major negative impacts on nesting forest birds, many of which are already in decline and at risk. Many studies show that creating corridors and forest edges in larger tracts increases the rates of nest predation and parasitism. Birds affected include numerous neotropical migrants such as Wood Thrush and Scarlet Tanager, as well as resident woodland birds. The fragmented forested areas represent much of the breeding habitat for these species in the region traversed by the pipeline. In turn, central New York is an important stronghold for breeding habitat for these species. The importance of the remaining undisturbed forest lands cannot be overstated.

CO13-1

See the responses to comments FA4-29 and FA4-30 regarding impacts on interior forests, migratory birds, and Constitution's proposed plan to address these issues. Constitution committed to reduce its construction right-of-way width by 10 feet based on our request for Constitution to assess measures to further minimize impacts on forested lands. We acknowledge that a 100-foot-wide construction right-of-way (reduced from 110 feet) is reasonable for a 30-inch-wide diameter pipeline in the subject terrain. This action would result in the preservation of approximately 52 acres of forest that otherwise would have been cut as originally proposed. Constitution provided additional information about mitigation including proposals to preserve other forested blocks in the project area as part of its Preliminary Migratory Bird and Upland Forest Plan which was filed on May 6, 2014. The perpetual preservation of forest areas, which could be at risk, along with other conservation measures would serve as compensation for Constitution's impacts upon forest lands.

COMPANIES AND ORGANIZATIONS

CO13 – Delaware-Otsego Audubon Society, Inc. (cont'd)

20140327-5014 FERC PDF (Unofficial) 3/27/2014 7:33:30 AM

CO13-1
cont'd

The US Geologic Survey's Breeding Bird Survey—the longest and most consistent study of breeding bird populations—documents significant downward trends in interior forest birds over the past 45 years. In New York State, these include average annual declines of 1.6% for Eastern Wood-Pewee; 3.3% for Wood Thrush; 1.9% for Veery; 1.2 % for Black-throated Blue Warbler; and 1.3% for Scarlet Tanager. Numerous other species show similar declines, and all inhabit woodlands to be impacted by the pipeline.

In addition, the calculations of impacted areas of forest provided in the DEIS are misleading. Although the acreage of these areas may appear small, their deep linear intrusion into previously undisturbed forest magnifies the negative effects of the corridor on birds many times. As we noted in our comments, clearings as narrow as 26 ft. are sufficient to allow access to bird predators and nest parasites.

The DEIS proposes largely undefined "mitigation" for impacts on forest birds, and states that the developer plans to reduce the right-of-way width from 110 ft. to 100 ft. where possible in woodlands. This demonstrates an appalling ignorance or convenient avoidance of the science we presented in our comments. A 100 ft. corridor is several times the width necessary to introduce the negative impacts found in avian studies. A 10 ft. reduction for mitigation is no mitigation at all. In fact there is no possible mitigation for these impacts, and to suggest there is serves only to provide the developer with a screen to avoid addressing the true negatives of the pipeline on birds.

CO13-2

In our earlier submission we noted that the list of bird species of conservation concern included in the developer's application did not reflect the current status of birds considered in need of management action or planning. Partners in Flight (PIF) is a cooperative effort of federal, state and local government agencies, foundations, and individuals interested in the conservation of birds not covered by existing conservation initiatives. PIF has conducted a comprehensive analysis of the regional and continental status of bird species and established a ranking of priority species. These include a number of species not considered in the Constitution application. Among these are: Broad-winged Hawk; Downy Woodpecker; Pileated Woodpecker; Eastern Wood-Pewee; Acadian Flycatcher; Red-eyed Vireo; Cedar Waxwing; Scarlet Tanager; Summer Tanager; Yellow-throated Vireo; White-breasted Nuthatch; Louisiana Waterthrush; Black-and-White Warbler; Hooded Warbler.

We stated that these species and the dangers to their habitat from pipeline construction should be considered in evaluating the application and preparing the DEIS. However these at risk species are not identified or otherwise recognized in the document. As such, it fails to consider impacts on this group of birds that through a collaborative and comprehensive analysis are known to be important and at risk.

CO13-3

Despite the clear scientific consensus and evidence that fragmenting forests produces significant impacts on at risk bird species, and despite the developer and FERC's own statistics showing that major forested areas will be affected by the pipeline, the DEIS somehow reaches the conclusion "... that the proposed projects would not have a significant adverse effect on wildlife." When projects pose such a clear and present threat to bird habitat as these do, one has to wonder what FERC and its staff could possibly consider a significant adverse effect. The bias in favor of approving this project is blatant and obvious.

CO13-2

Table 4.6.1-2 has been updated with some of the species listed in this comment. However, several species included in the comment (pileated woodpecker, red-eyed vireo, cedar waxwing, summer tanager, white-breasted nuthatch) were not added to the table because they are absent from the list of birds of conservation concern (which includes information from Partners in Flight) in New York as found on Audubon's website accessed at:

<http://ny.audubon.org/sites/default/files/documents/birdsofconservationconcernny.pdf>.

CO13-3

See the response to comment FA1-1. See sections 4.5 and 4.6 of the EIS regarding impacts on wildlife habitat, including discussion of Constitution's Preliminary Migratory Bird and Upland Forest Plan.

COMPANIES AND ORGANIZATIONS

CO13 – Delaware-Otsego Audubon Society, Inc. (cont’d)

20140327-5014 FERC PDF (Unofficial) 3/27/2014 7:33:30 AM

CO13-3
cont'd

We urge that this document be withdrawn, and an even-handed and scientifically valid environmental review of these major projects be carried out and submitted for public consideration, as required by law.

Andrew Mason, Co-President
Delaware-Otsego Audubon Soc.
Oneonta, NY

COMPANIES AND ORGANIZATIONS

CO14 – Center for Sustainable Rural Communities

Center for Sustainable Rural Communities
PO Box 193
Richmondville, New York 12149

March 15, 2014

Ms. Kimberly D. Bose
Secretary
Federal Energy Regulatory Commission
888 First Street, NE
Washington, D.C. 20426

Us Army Corps of Engineers
New York District CENAN-OP-R
Upstate Regulatory Field Office
1 Buffington Street, Bldg. 10, 3rd Floor
Watervliet, New York 12189-4000

RE: Docket Nos. CP13-499 and CP13-502, NAN-2012-00449-UBR

CO14-1

The Center for Sustainable Rural Communities (CSRC) is a 501 (C)3 non-profit New York Corporation which advocates for vibrant, livable and sustainable rural communities in Upstate, New York. The CSRC encourages environmentally-compatible economic development, access to arts and technology and progressive community and land-use planning while working to preserve the rural character and ecological and cultural diversity of the region. The CSRC is an Intervener in the matter of the proposed Constitution Pipeline.

On March 26, 2014 Constitution Pipeline, LLC submitted “additional information” to their application for a Certificate of Public Convenience and Necessity for the proposed Constitution Pipeline in which they announced their intent to erect 100-foot tall monopole antennae at eleven (11) locations along the proposed pipeline route.

Given that the addition of the antenna towers represents a substantive change to the project with just twelve (12) days remaining in a forty-five (45) day public comment period, **the CSRC calls on FERC To extend the comment period at least sixty (60) days to allow all potentially impacted and interested parties sufficient time to evaluate the new information and develop and submit comments in response to that information.** The CSRC further requests that FERC issue a revised/supplemental DEIS that includes a comprehensive evaluation of the potential impacts of the proposed towers on the communities and environments near which they would be sited.

CO14-2

CO14-1

See the response to comment FA1-1 regarding the comment period.

CO14-2

See the response to comment SA2-1 regarding the communication towers.

COMPANIES AND ORGANIZATIONS

CO14 – Center for Sustainable Rural Communities (cont'd)

S-248

- | | |
|--------|---|
| CO14-3 | <p>The following factors underscore the need for additional time to evaluate the addition of the eleven (11) antenna towers to the proposed project and need for the FERC to issue a revised DEIS:</p> <ul style="list-style-type: none"> Residents living in proximity to the proposed towers may be subject to light pollution, the disruption of their viewscape and an associated degradation of their quality of life and the ability to enjoy their property to the extent anticipated before the installation of the towers. |
| CO14-4 | <ul style="list-style-type: none"> The proximity of 100' towers to residences may have a negative impact on property values and the marketability of those properties. The resulting devaluation may also trigger landowner property tax assessment appeals and lower municipal tax revenues. |
| CO14-5 | <ul style="list-style-type: none"> The towers may increase the mortality of migratory birds, including some that may be listed as threatened or endangered. For example, the Town of Wright (Schoharie County), which would likely host one or more of the towers, has documented its sensitive bird population as part of its 2013 <i>Updated Comprehensive Plan</i> which states that "[a]ll songbirds have protected status, but in Wright, several species are also listed by New York State as threatened and of special concern. One species that is listed as threatened is the Northern Harrier. Two other bird species are listed as species of special concern: Sharp-Shinned Hawk and Coopers Hawk¹. |
| CO14-6 | <ul style="list-style-type: none"> VHF/UHF radio wave emissions from the towers may have an impact on echolocation and other vital activities of nearby bat colonies already weakened by an epidemic of a virulent fungal infection known as White Nose Syndrome, which was first identified in the cave systems of Schoharie County, NY in 2009.² |

¹ *Updated Town of Wright Comprehensive Plan*, 2013, page 58-59.
<http://www.schohariecounty-ny.gov/CountyWebSite/townwri/2013JuneDraftPlan1.pdf>

² Blehert, D. S.; Hicks, A. C.; Behr, M.; Meteyer, C. U.; Berlowski-Zier, B. M.; Buckles, E. L.; Coleman, J. T. H.; Darling, S. R.; Gargas, A.; Niver, R.; Okoniewski, J. C.; Rudd, R. J.; Stone, W. B. (2009). "Bat White-Nose Syndrome: An Emerging Fungal Pathogen" (PDF). *Science* 323 (5911): 227. doi:10.1126/science.1163874. PMID 18974316.

- | | |
|--------|---|
| CO14-3 | <p>Constitution confirmed that the proposed towers would not emit light or sound. Constitution also provided a visual assessment report. The EIS has been updated to include this new information.</p> |
| CO14-4 | <p>We researched the potential impact associated with communication towers on property values and we have updated section 4.9.5 of the EIS with this information. There is no consistent evidence that communication towers devalue property.</p> |
| CO14-5 | <p>We have updated section 4.6.1 of the EIS to discuss the potential impacts of the proposed towers on migratory birds. The FWS provided general guidance for tower installation in relation to migratory birds, with recommendations such as limiting tower height to 200 feet or less and not using lighting or guy wires. Constitution's towers are consistent with the FWS' recommendations.</p> |
| CO14-6 | <p>Constitution indicated that digital subscriber line internet (primary) and cellular (secondary) would be the main modes of supervisory control and data acquisition (SCADA) communication at these facilities. We conclude that the use of ultra-high frequency (UHF) radio as a tertiary or emergency backup system would likely not cause significant or ongoing impacts on bat echolocation (see section 4.7 of the EIS for more detail and references), and would be necessary in cases of an emergency.</p> |

COMPANIES AND ORGANIZATIONS

CO14 – Center for Sustainable Rural Communities (cont'd)

S-249

CO14-7	<ul style="list-style-type: none"> While the height of the proposed towers may be below some regulatory thresholds, they may still require evaluation and approval by the Federal Communications Commission (FCC) and/or the Federal Aviation Agency (FAA) depending on their potential impacts on air traffic and other criteria.³
CO14-8	<ul style="list-style-type: none"> The towers may require review and approval for compliance with relevant zoning and other land use regulations of local jurisdictions. For example, zoning regulations in the Town of Richmondville, a municipality intersected by the proposed pipeline route and a likely site (near MP 108) for a tower, state the following: “[n]o telecommunication tower and/or facilities shall hereafter be used, erected, moved, reconstructed, changed or altered in any district in the Town of Richmondville except after approval of a Special Use Permit and in conformity with these regulations. No existing structure shall be modified to serve as a transmission and/or receiving tower unless in conformity with these regulations. A licensed engineer must approve any changes.” The regulations go on to state that: “[t]hese regulations shall apply to all property in all districts where application for special use permit is made for telecommunications facilities. Special Use Permits must receive proper Planning Board review in accordance with the review guidelines outlined in this Law.”⁴
CO14-9	<ul style="list-style-type: none"> The depth of the tower foundations and the ubiquitous nature of shallow bedrock (as noted in the DEIS) may require boring that is augmented by blasting, not previously identified in Constitution’s Blasting Plan. Blasting necessary to erect the proposed towers may also occur in proximity to fragile karst geological formations and associated watersheds and aquifers.
CO14-10	<ul style="list-style-type: none"> Activities related to the transportation of materials and construction of the towers may exacerbate soil compaction and alter storm water runoff and may negatively impact transportation infrastructure such as roads, highways and bridges.

³ The FCC has been given the authority by Congress to require the painting and/or illumination of antenna towers when it determines that such towers may otherwise constitute a menace to air navigation. 47 U.S.C. § 303(q). The FCC’s rules governing antenna tower lighting and painting requirements are based upon the advisory recommendations of the FAA, which are set forth in two FAA Advisory Circulars. 47 CFR §§ 17.21-17.58. Although the FAA’s lighting and painting standards are advisory in nature, the FCC’s rules make the standards mandatory. The standards and specifications set forth in these FAA documents are incorporated by reference into the FCC’s rules, making these advisory standards mandatory for antenna towers.

⁴ Town of Richmondville Zoning Law, Amended June 7, 2001, § 412 (C)(1) & (2).

3

CO14-7	Based on our review of Federal Aviation Administration (FAA) regulations found at 49 CFR Part 77.9, we conclude that FAA notice would not be required. Constitution committed to coordinate with the FAA regarding proximity of the towers to airports.
CO14-8	Constitution would seek authorization for applicable local zoning requirements.
CO14-9	Constitution stated that it did not propose to embed the monopole; rather, it would be flange mounted to a foundation base and secured in place with stud bolts. Constitution reported that the layered bedrock would be rippable by construction equipment and that blasting would not be required to set the foundation.
CO14-10	See the responses to comments CO1-4 (soil compaction and stormwater runoff) and LA1-1 (road damage).

COMPANIES AND ORGANIZATIONS

CO14 – Center for Sustainable Rural Communities (cont'd)

CO14-11

- Because the submission by Constitution shows only a “typical communications tower” it is impossible to conduct an design/engineering evaluation of the proposed design architecture nor is it possible to draw reliable conclusions about the tower’s structural reliability or suitability for the locations in which they will be sited, relative to soil types, wind conditions, historical flood patterns and other factors that may impact the long-term integrity of the structures and their susceptibility to failure.



Historical data does indicate some vulnerability of the monopole design to failures resulting from poor welds, metal fatigue and other factors such as the monopole base plate failure illustrated in **Figure 1**. The submission by Constitution does not reference industry standards such as the *TR-14 Structural Standards for Communication and Small Wind Turbine Support Structures*⁵ nor does

Figure 1 – Monopole Baseplate Failure

it indicate the rating of the proposed towers under wind loading commensurate with average conditions recorded for each proposed site, nor does it indicate any knowledge of those wind conditions, nor does it detail any consideration of additional stresses that might result from heavy ice loads and other common conditions along the proposed route.

CO14-12

- The Towers may be an additional target of interest to malicious individuals who are intent on initiating physical and/or cyber-attacks on pipeline support infrastructure, as described as part of our organization’s previous comment submitted on March 15, 2014⁶.

Respectfully submitted,

Robert Nied
Member- Board of Directors
Center for Sustainable Rural Communities

⁵ <http://www.tiaonline.org/all-standards/committees/TR-14>

⁶ http://elibrary.FERC.gov/idmws/file_list.asp?accession_num=20140318-5011

CO14-11

The comments regarding potential tower failure are noted. Additional engineering designs were provided by Constitution on June 3, 2014 and can be accessed at: http://elibrary.ferc.gov:0/idmws/file_list.asp?document_id=14222572

CO14-12

See the response to comment CO8-3.

COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline



Stop the Constitution Pipeline, PO Box 48, East Meredith, New York 13757
info@stopthepipeline.org | www.stopthepipeline.org

March 27, 2014

Via **Electronic Filing**: efiling@ferc.gov

Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
888 First Street, NE
Washington, DC 20426

Re: Request for Extension of Time for Public Comment on Draft Environmental Impact Statement for Constitution Pipeline and Wright Interconnect Projects, Docket Nos. CP13-499-000 and CP13-502-000

Dear Ms. Bose:

CO15-1 | The undersigned groups and individuals hereby urge the Federal Energy Regulatory Commission (“FERC”) to extend the period of time during which it will accept comments by the public on the Draft Environmental Impact Statement (“DEIS”) for the proposed Constitution Pipeline and Wright Interconnect Projects. Specifically, we echo the request submitted by the New York State Department of Environmental Conservation (“DEC”) on March 24, 2014 that calls for an extension of the close of the public comment period through May 30, 2014. We agree with the DEC that the public cannot evaluate the impacts of the proposed project without all of the required information and documents, and cannot offer meaningful comments without additional time to review the voluminous DEIS and supplemental studies. We, therefore, urge FERC to grant this request for an extension of the public comment period and to notify the parties to the above-referenced proceedings of the Commission’s grant or denial of this request by Monday, March 31, 2014.

Respectfully submitted,

Stop the (Constitution) Pipeline

CO15-1 | See the response to comment FA1-1 regarding the comment period.

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COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline (cont’d)

Additional Signatories

Advocates for Cherry Valley, Inc.
Cherry Valley, NY
Lynn Marsh, President

Advocates for Morris
Morris, NY
Maureen Dill, Chair

Advocates for Springfield
Springfield, NY
Harry Levine, President

Andes Works!
Andes, NY
Ann Roberti, Member

Berks Gas Truth
Berks County, PA
Karen Feridun, Founder

Breathe Easy Susquehanna County (BESC)
Montrose, PA
Rebecca Roter, Chairperson

Brewery Ommegang
Cooperstown, NY
Larry Bennett, Director of Creative Services

Broadway Democrats
69th Assembly District, Part C, New York, NY
Rachelle Bradt, Steering Committee

Catskill Citizens For Safe Energy
Fremont Center, NY
Jill Wiener

The Center for Sustainable Rural Communities
Richmondville, NY
Robert K. Nied, Member - Board of Directors

CEEC (Citizens Energy and Economics Council of Delaware County)
Delaware County, NY
Joan Tubridy, Secretary

S-252

COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline (cont’d)

Citizens for Water
New York, NY
Joe Levine, Director

ClimateActionNowMA.Org
Chicopee, MA
George Aguiar, Steering Committee

Coalition Against the Rockaway Pipeline (CARP)
Brooklyn, NY
Edie Kantrowitz, Co-Coodinator

Community Watersheds Clean Water Coalition
Bedford, NY
Fay Muir, President

Concerned Burlington Neighbors
Burlington, NY
Suzy Winkler, Co-founder

Concerned Citizens of Montauk
Montauk, NY
Jeremy Samuelson, Executive Director

Concerned Edmeston Neighbors
Edmenston, NY
Kathleen Mechan, Director

Concerned Residents of Oxford
Oxford, NY
Mina Takahashi, Founding Member

Concerned Worcester Citizens
Worcester, NY
Clark Rhoades, Core member

Crumhorn Lake Association
Maryland, NY
Jim May, President

Damascus Citizens for Sustainability
Damascus Township, PA
B. Arrindell, Director

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COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline (cont’d)

S-254

DAG (Delaware Action Group)
Delaware County, NY
Heidi Gogins, Member

Delaware-Otsego Audubon Society
Delaware and Otsego County, NY
Andy Mason, Co-President and Conservation Chair

ExtraAction TIG
Society for Applied Anthropology
Jeanne Simonelli, Convenor

Food & Water Watch
Alex Beauchamp
Northeast Region Director

Franklin Local
Franklin, NY
Gene Marner, Core Member

Friends of Sustainable Sidney
Sidney, NY
Cathy McNulty, Core Member

Grassroots Environmental Education
Port Washington, NY
Patricia J. Wood, Executive Director

Gray Panthers
New York State
Joan Davis, Board of Directors Member

Landscape Alternatives, LLC
Cherry Valley, NY
Lynn Marsh and Doug DeLong, Owners

MRAD, Maryland Residents Against Drilling
Maryland, NY
Kristina Fedorov

Middlefield Neighbors
Middlefield, NY
Kelly Branigan, Founding Member

COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline (cont’d)

Milford Doers
Milford NY
Otto Butz, Facilitator

Minisink Matters
Orange Co, NY
Asha Canalos, Co-Founder

The Mothers Project
New York, NY
Angela Monti Fox, President

Move On Council of Massachusetts
Franklin-Hampshire County, MA
Jenny Daniell, Council Organizer

New York Climate Action Group
New York, NY
Robert Jereski, Co-Founder

No Fracked Gas in Mass
Hampshire County, MA
Rosemary Wessel, Katy Eiseman, Co-Founders

Occupy The Pipeline
New York, NY
Kim Fraczek, Co-Founder

Otsego 2000
Cooperstown, NY
Ellen Pope, Executive Director

Otsego Neighbors
Fly Creek, NY
Julie Huntsman, DVM, Representative

Peacemakers of Schoharie
Cobleskill, NY
Wayne R. Stinson

Plymouth Friends of Clean Water
Plymouth, NY
Peter Hudiburg, Founder

COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline (cont’d)

Protect Laurens
Otsego County, NY
Kathy Shimberg, Co-founder and Core Member

Residents of Crumhorn Mountain
Maryland NY
Otto Butz, Facilitator

ROAR Against Fracking
Roseboom, NY
Allegra Schechter, Founder

Roseland Against the Compressor Station
Roseland/Essex County, NJ
Ted Glick, Steering Committee

Sane Energy Project
New York, NY
Clare Donohue, Founding Member

Shale Justice Coalition
Lewisburg, PA
Kevin Heatley, Executive Committee

Sharon Springs Against Hydrofracking
Sharon Springs, NY
Lisa Zaccaglioni, Co-Founder

Sierra Club Atlantic Chapter
Albany, NY
Jeffrey Bohner, Chapter Chair

Skyhill Farm
Seward, NY
Louise Johnson, Owner

Sproutopia LLC
Roseboom, NY
Rebekah Schechter, Founder

Stop the Algonquin Pipeline Expansion (SAPE)
Garrison, NY
Paula Clair, Co-founder

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COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline (cont’d)

Sustainable Otsego
Otsego County, NY
Adrian Kuzminski, Moderator

United for Action
New York, NY
Edie Kantrowitz, Board Member

Western NY Drilling Defense
Erie County, NY
Rita Yelda, Founder

We The People Matter
Orange Co, NY
Asha Canalos, Co-Founder

Carl Arnold
East Meredith, NY

Lisa Barr
Oneonta, NY

Delores Bennett, RN
Unadilla, NY

John Bennett
Unadilla, NY

Anna Berg
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Linda Bevilaqua
Franklin, NY

Anthony G. Breuer
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Craig Buckbee
Burlington, NY

Mary T. Burns
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Cynthia Campbell
Cherry Valley, NY

COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline (cont’d)

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Burlington Flats, NY

Nicholas Ciccarello
Franklin, NY

Kathi Chipman
Davenport, NY

Susan Dey
Andes, NY

Valerie Dudley
Kortright, NY

Patricia Duncan
Roseboom, NY

Holly, David, and Zachary Fanion
Middlefield, NY

Jane Fasullo
Setauket, NY

Kristina Fedorov
Maryland, NY

Michael Fedorov
Maryland, NY

Mark Fedorov
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Ava Fedorov
Brooklyn, NY

Bill Feldman
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Bruce Ferguson
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Carolyn A. Fink
Franklin, NY

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COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline (cont’d)

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Caitlin Gareth
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Heidi Gogins
Bovina, NY

Thomas Gorman
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Bernard Handler
Damascus, PA

Howard Hannum
Trout Creek, NY

Jenny Heinz
New York, NY

Karen Hirsch
New York, NY

Carol J. Hochberg
Chester, NY

Wayne Hoffman
East Meredith,NY

Diana and Phil Hulbert
East Meredith, NY

Pamela Jenkins
Cortland, NY

Robert Jereski
New York, NY

Sarah J. Kelsen
Finger Lakes Regional Organizer, New Yorkers Against Fracking

Catherine Kernan
Worcester, NY

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COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline (cont’d)

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Sandra Kissam
Newburgh, NY

Bob Lidsky
Andes, NY

Stephanie Low
New York, NY

Kerry Lynch
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Diane MacInnes
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Laura G. Malloy
Mt. Vision, NY
Ph.D. Professor of Biology Hartwick College

Joseph T. Malloy
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Carmela Marner
Franklin, NY

Carole Satrina Marner
Franklin, NY

Gene Marner
Franklin, NY

Loddie Marsh
Sidney, NY

Caroline Martin
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Mary Menapace
Skaneateles, NY

George Meszaros Jr.
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COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline (cont’d)

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Katherine O'Donnell
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Margo Pellegrino
Medford Lakes, NJ

Rachel Polens
Meredith, NY

Mark Pezzati
Andes, NY

Hazen Reed
Oneonta, NY

Charles Reiman
Middlefield, NY

Mrs. Tammy Reiss
Butternuts, NY

Mr. Matthew Reiss
Butternuts, NY

The Rev. Elsie Armstrong Rhodes, Pastor
First Presbyterian Church, Cooperstown, NY

Ann Roberti
Andes, NY

Beth Rosenthal
Otsego County Representative, District 7

COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline (cont’d)

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Sharon Springs, NY

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Alice Slater
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Vincent Speranza
Franklin, NY

Dr. Susan Spieler
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Wayne R. Stinson
Summit, NY

Eleanor Stromberg
Schenevus NY

Michael Suchorsky
Andes, NY

Joan Tubridy
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Kristina Turechek
Laurens, NY

Ellen Weininger
Scarsdale, NY

Janet Windus
Ninevah, NY

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COMPANIES AND ORGANIZATIONS

CO15 – Stop the Pipeline (cont’d)

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Alice Zinnes
Brooklyn, NY

Harriet Zinnes
New York, NY

COMPANIES AND ORGANIZATIONS

CO16 – Otsego County Conservation Association

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Ms. Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
888 First Street NE, Room 1A
Washington DC 20426

March 28, 2014

Re: Docket No. CP13-499-000 and Docket No. CP13-502-000

Dear Ms. Bose:

CO16-1 Otsego County Conservation Association, Inc. (OCCA) has reviewed the Federal Energy Regulatory Commission's "Draft Environmental Impact Statement on the Constitution Pipeline and Wright Interconnect Projects," FERC EIS 02490, dated February 2014.

Founded in 1968, OCCA is Otsego County's oldest private, non-profit environmental conservation organization. We are a membership group dedicated to promoting the appreciation and sustainable use of Otsego County's natural resources through education, advocacy, resource management, research, and planning. OCCA plays a key role in initiating and carrying out programs designed to improve and/or protect Otsego County's air, land, and water.

Although the route as currently proposed does not traverse Otsego County, development of this pipeline will inevitably result in environmental, social and economic change for our region. Speaking on behalf of its 800+ members and volunteers, and recognizing the considerable amount of time and effort invested by FERC in its review, OCCA continues to have numerous concerns with the draft EIS in particular and these projects in general, relating to:

- Sustainable management and use of renewable natural resources
- Protection and conservation of biodiversity, including endangered species and sensitive ecosystems in modified, natural and critical habitats
- Pollution prevention and waste minimization, pollution controls (liquid effluents and air emissions) and solid and chemical waste management
- Efficient production, delivery and use of energy
- Cumulative impacts of existing projects, the proposed project, and anticipated future projects.

CO16-6 Rather than disturbing our lands and putting our waters at risk, OCCA believes that our county, our state, and our nation as a whole should focus on decreasing our use of fossil fuels and be turning instead to applications of renewable energy sources. As such, we recommend that before granting its approval to the proposed Constitution Pipeline and Wright Interconnect Projects, FERC should verify, first and foremost, that there is a true public need.

"...dedicated to the protection, appreciation and enhancement of the natural resources within Otsego County..."

P.O. Box 931, Cooperstown, New York 13326

Ph: 607.547.4488 · Email: director@occainfo.org · www.occainfo.org

CO16-1 Alternate energy sources, including renewable sources, are discussed in section 3.1.

CO16-2 Sensitive resources, as well as potential impacts and mitigation, are discussed in the EIS for interior forest (section 4.5.3), waterbodies (section 4.3.3), wetlands (section 4.4 and appendix L), and threatened and endangered species (section 4.7).

CO16-3 A discussion of air emissions can be found in section 4.11 of the EIS. As discussed in section 2.3 of the EIS, Constitution and Iroquois would implement their respective spill plans during construction and operation to prevent and if necessary contain and clean-up accidental spills.

CO16-4 The FERC does not regulate production of natural gas, however we have considered production in the cumulative impacts section (4.13) of the EIS. Alternative delivery options and other energy sources are discussed in section 3.0 of the EIS.

CO16-5 Cumulative impacts are discussed in section 4.13 of the EIS.

CO16-5 See the response to comment LA7-5 regarding need for the proposed projects.

COMPANIES AND ORGANIZATIONS

CO16 – Otsego County Conservation Association (cont'd)

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CO16-7 If FERC determines that this need does exist and ultimately grants a Certificate of Public Convenience and Necessity to these projects, we ask that the related development be managed in a manner which ensures our region minimal negative impact and maximum sustainability. In order to properly assess need and evaluate impacts, we also ask that FERC extend the public comment period through May 30, 2014.

CO16-8

CO16-9 That being said, and while the pipeline as planned itself does not travel through Otsego County, there are potential adverse impacts to Otsego County which must be considered, particularly in areas where the proposed pipeline construction would take place below the southern border of Otsego County in Delaware County and where the proposed construction route crosses over water bodies that form part of the Susquehanna River Watershed and thus flow into Otsego County via tributaries to the Susquehanna.

For these reasons and because construction of the Constitution Pipeline and related facilities could have larger scale regional impacts, it is concerning that FERC's draft EIS does not address potential impacts and mitigation measures specific to Otsego County.

OCCA's comments are primarily on the draft EIS Section 4.0, "Environmental Analysis," which is organized by the following major resource topics: geology; soils; water resources; wetlands; vegetation; wildlife and aquatic resources; special status species; land use, recreation, special interest areas, and visual resources; socioeconomics (including transportation and traffic); cultural resources; air quality and noise; reliability and safety; and cumulative impacts.

Though extensive, we find that this analysis is limited in scope and area, as potential impacts are largely only considered as they occur in the immediate vicinity of the construction sites. Impacts to Otsego County are, for the most part, completely absent from this review. For the purposes of OCCA's specific interests, this absence in and of itself is considered a major deficiency of the draft EIS as it inappropriately leaves Otsego County out of discussions of potential impacts and potentially critical mitigation measures.

CO16-10 The proposed pipeline route will cross at least two significant tributaries to the Susquehanna River in Otsego County (Charlotte Creek and Ouleout Creek), both of which have proven particularly vulnerable to severe flooding in recent years. What's more, the proposed pipeline crosses northern Delaware County – through sensitive wetlands areas – prompting questions regarding potential impacts both to the Susquehanna River Watershed and its water resources and to Otsego County's general environment. Consideration must also be given to the two contractor yards in Oneonta and Maryland, as well as the increased traffic through Otsego County and other socio-economic impacts associated with construction activities taking place in such close proximity in Delaware County.

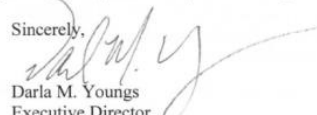
CO16-11

CO16-12

CO16-13

Please see the following comments on FERC's draft EIS with regard to areas of particular concern for potential impacts to Otsego County.

Sincerely,



Darla M. Youngs
Executive Director

- CO16-7 Section 4.1 discusses the four temporal levels of impacts that were considered throughout the EIS: temporary, short-term, long-term, and permanent. Our first priority is to avoid or prevent environmental impacts associated with a project where practicable. Where the complete prevention of impacts is not practicable, then we strive to minimize and mitigate such impacts. This section further states that "Applicants, as part of their proposals, developed certain mitigation measures to reduce the impact of the projects. In some cases, we determined that additional mitigation measures could further reduce the project's impacts. We will recommend to the Commission that these measures be included as specific conditions in the Certificate the Commission may issue to the Applicants for these projects."
- CO16-8 See the response to comment FA1-1 regarding the comment period.
- CO16-9 The commentator's statement regarding Otsego County is noted. The proposed pipeline route does not cross Otsego County. Generally, impacts on waterbodies and wetlands would be limited to the area surrounding the actual crossing and therefore would not be expected to extend to Otsego County. Since filing of the draft EIS, Constitution has removed contractor yard spread 4b. Therefore, there is now one proposed contractor yard within Otsego County – Yard 4a (Glasso Yard).
- CO16-10 The proposed pipeline route is not located in Otsego County. We note that Charlotte Creek and Ouleout Creek would be crossed in Delaware County, upstream of the Susquehanna River. Section 4.1.3 of the EIS has been revised to provide additional information regarding flooding.
- CO16-11 See the response to comment CO16-9.
- CO16-12 Sensitive resources, such as waterbodies (section 4.3) and wetlands (section 4.4), as well as potential impacts and mitigation associated with all of the proposed contractor yards (including the one in Otsego County), are discussed throughout the EIS.
- CO16-13 Potential socioeconomic impacts, including traffic, for Otsego County and all other counties directly affected by the proposed projects, were evaluated in section 4.9 of the EIS.

COMPANIES AND ORGANIZATIONS

CO16 – Otsego County Conservation Association (cont'd)

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CO16-14	<p>Otsego County Conservation Association, Inc.'s Comments on the Federal Energy Regulatory Commission's "Draft Environmental Impact Statement on the Constitution Pipeline and Wright Interconnect Projects," FERC EIS 02490, dated February 2014.</p> <p>Comments on Section 4.1 – Geology</p> <p>4.1.3.5 – Flash Flooding The FERC EIS fails to address potential impacts to Otsego County in the event of flash floods occurring in tributaries of the Susquehanna River affected by pipeline construction (Charlotte Creek and Ouleout Creek). As the EIS notes, these creeks have been subject to severe flash flooding events in recent years with particularly deadly consequences, as when the Ouleout Creek washed out a portion of Interstate 88, leading to the deaths of two tractor trailer operators. Both the Ouleout and Charlotte creeks are tributaries of the Susquehanna River in southern Otsego County and, as a result, any geologic impacts of pipeline construction that may result in an increased likelihood or worsening of flood events would be of particular concern to Otsego County communities.</p> <p>4.1.5 – General Impacts and Mitigation The potential hazards of flash flood events for Otsego County could be further mitigated through coordination with Otsego County officials focusing on continuous monitoring of geologic conditions in affected water bodies as well as the implementation of short-term preventative measures in the event of any predicted heavy rainfall or snowmelt to reduce the severity of possible flash flood events.</p>
CO16-15	<p>Comments on Section 4.3 – Water Resources</p> <p>In this section there is a lack of discussion of how water resources in Otsego County may be potentially affected or how aquifer or groundwater resources affected by pipeline construction in adjacent counties might impact Otsego County.</p>
CO16-16	<p>4.3.2.1 – Groundwater General Impacts and Mitigation The EIS states that the majority of the pipeline crosses unconfined aquifers and addresses potential risks associated with spills of any hazardous materials used in construction: fuels, lubricants or any other potential contaminants. However, the EIS is limited in how it addresses the hazards to larger areas associated with these potential spills and the kinds of monitoring and mitigation that would be needed to ensure that contamination does not spread out to groundwater resources in areas not immediately surrounding the location of such spills. This is important for areas near the southern border of Otsego County, particularly water bodies and wetlands in this area. Again, there should be coordination with appropriate Otsego County agencies to monitor and mitigate any potential adverse impacts to Otsego County in such an event.</p>
CO16-17	<p>4.3.3.2 – [Public Watersheds] General Impacts and Mitigation In this section the EIS addresses major impacts to the Susquehanna River Watershed that could arise from construction activities in numerous smaller water bodies that feed tributaries of the Susquehanna River. Activities such as clearing riverbanks of existing soil and vegetation coverage, in-stream blasting and vehicle re-fueling may result in potential disturbances to and</p>
<hr/> <p>Otsego County Conservation Association, Inc. Page 1</p>	

CO16-14 See the response to comment CO16-10.

CO16-15 See the response to comment CO16-9. Impacts on Otsego County aquifers and groundwater resources from the proposed projects are not anticipated.

CO16-16 As stated in sections 2.3 and 5.1.3 of the EIS, Constitution and Iroquois would prevent or adequately minimize accidental spills and leaks of hazardous materials during construction and operation by adhering to their spill prevention plans. In addition, as stated in section 4.3.3.6 of the EIS, if a spill were to occur, immediate downstream users of the water could experience degradation in water quality. Impacts on Otsego County surface water and groundwater resources are not anticipated. In accordance with Constitution's spill plan, it would notify the appropriate government officials if reportable releases were to occur.

CO16-17 Impacts from sedimentation and water turbidity would be expected within the immediate vicinity of the waterbody crossing, although these impacts would be minimized through the use of trenchless or dry crossing methods. Section 4.3.3.6 of the EIS discusses construction and mitigation procedures that Constitution would use to minimize impacts on watersheds.

COMPANIES AND ORGANIZATIONS

CO16 – Otsego County Conservation Association (cont'd)

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CO16-17 cont'd	contamination of water bodies downstream of construction sites, including changes to sedimentation, water turbidity, stream velocity and contamination due to spills of hazardous materials or chemical or nutrient pollution from disturbing sediment. Given these major potential impacts it would seem necessary to widen the area in which monitoring and mitigation measures would be assessed and/or implemented.
CO16-18	4.3.4 – Conclusion This section states that “No long-term impacts on surface waters are anticipated as a result of the proposed projects because Constitution would not permanently affect the designated water uses, it would bury the pipeline beneath the bed of all water bodies, it would implement erosion controls, and it would restore the stream banks and streambed contours as close as practical to pre-construction conditions.” However, these restorative measures should be extended to any downstream locations outside of the construction areas that may be permanently altered in the same manner mentioned above due to the effects of construction activities taking place upstream. Further, if these restorative measures are not implemented properly, or if construction activities are undertaken in an improper manner, the impacts to Otsego County could be potentially significant. Further, there will be two contractor yards associated with this project located in Otsego County (in Maryland and Oneonta). There needs to be more information on these particular sites and the potential impact to water resources from run-off of possible vehicle and equipment fuel leaks, construction supplies/materials and the storage of other potentially hazardous materials.
CO16-19	Comments on Section 4.4 - Wetlands This section begins by stating that a total of 91.8 acres of wetlands would be affected by the proposed pipeline project and addresses attempts to mitigate effects of construction activities within these wetlands. However, it does not address potential effects of disturbing wetlands ecology and hydrology on a wider scale and how construction may potentially impact the ecology and hydrology of areas beyond these wetlands, particularly near the border with Otsego County or in Susquehanna River Watershed areas. 4.4.3 – General Impacts and Mitigation According to Appendix L-2, “Wetlands Associated with Constitution Pipeline Project – New York,” the proposed pipeline would have crossing lengths in towns bordering Otsego County of 2,329 ft. (Town of Franklin), 3,740 ft. (Town of Davenport) and 3, 242 ft. (Town of Harpersfield). Given the proximity of some of these areas to Otsego County there is potential for larger scale adverse impacts to environments in Otsego County as well as to the Susquehanna River Watershed as a whole, where these wetlands areas contribute to Susquehanna River tributaries. Given these proximities there should be further study of the potential impact of Delaware County wetlands areas on Otsego County as well as pre-construction assessments that would allow any post-construction restorative work to include areas of Otsego County affected.
<hr/>	
Otsego County Conservation Association, Inc. Page 2	

- CO16-18 See the response to comment CO16-9. As stated in Constitution’s Resource Report 1, the contractor yards would be used for “equipment, pipe, and material storage, as well as temporary field offices and pipe preparation/field assembly areas.” We have updated section 2.2.3 of the EIS with this information. Constitution’s spill prevention plan would also apply to contractor yards.
- CO16-19 Wetland disturbance would be limited to wetlands within authorized workspaces. Because of the shallow depth of excavations, we do not expect construction to result in changes in hydrology sufficient to impact wetlands distant from the construction right-of-way.

COMPANIES AND ORGANIZATIONS

CO16 – Otsego County Conservation Association (cont'd)

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CO16-20 | Comments on Section 4.5 – Vegetation

4.5.4 – Noxious Weeds and Other Invasive Plant Species

This section describes the potential risk of pipeline construction activities (clearing of vegetation, etc.) in creating the conditions for the arrival of invasive plant species and outlines Constitution's management plans which are in accordance with applicable New York State guidelines.

However, even if these management plans are followed through at the site of construction, there is still a potential risk that movement of construction equipment in and out of the construction site may inadvertently transport invasive species to locations not near the construction sites.

This risk should be identified and addressed in the EIS and included in all Constitution invasive species management and mitigation measures.

CO16-21 | Comments on Section 4.6 – Wildlife and Aquatic Resources

4.6.1.3 – Migratory Birds

The EIS accurately states that construction activities may disrupt breeding and nesting habits of migratory birds in affected areas but perhaps too optimistically states that these affects would be short-lived due to the temporary nature of construction. Further study should be conducted to assess possible long-term impacts of displacement of migratory bird habitats, especially as it relates to areas farther afield from construction sites.

CO16-22 | 4.6.1.4 – General Impacts and Mitigation

This section needs to address the potential impacts to regions outside of the immediate construction area to include the widespread effects of possible habitat fragmentation or displacement of specific species. If habitats are fractured and migration routes are disturbed – or if affected species resettle in new habitats, potentially displacing or disturbing additional habitats – it could lead to long-term effects for habitats well outside of the construction site, particularly in Otsego County. Outlined mitigation measures seem limited to restoring conditions to along the construction route. However, because the impact to wildlife could be potentially widespread, greater coordination with NYS DEC is needed in monitoring potential large-scale effects and ensuring Constitution's involvement in longer-term mitigation strategies.

CO16-23 | 4.6.2 – Aquatic Resources

This section addresses potential impacts of pipeline construction on aquatic resources and fisheries in the affected areas. The EIS recommends construction of in-stream crossings of trout and trout spawning water bodies during an appropriate timeframe. Because these construction activities could affect certain tributaries of the Susquehanna River (Charlotte Creek for example) this should be of particular concern to Otsego County. Any adverse impacts to aquatic resources due to construction activities crossing the Charlotte Creek in Delaware County could negatively impact fishing resources farther downstream, in particular the Fortin Park area in Oneonta, near the confluence of Charlotte Creek and the Susquehanna River. If the FERC recommendations are not properly complied with, these areas in Otsego County could be negatively impacted. Further, all of the potentially hazardous impacts to water bodies due to construction activities at water body crossings or river or stream banks (soil erosion, increased sedimentation, chemical spills, etc.) could negatively impact aquatic resources in Otsego County as well.

CO16-20

As stated in section 4.5.4 of the EIS, implementation of Constitution's Invasive Species Management Plans and our recommendation to finalize surveys and the locations of weed wash stations before construction would effectively minimize or mitigate the potential spread of noxious or invasive weeds.

CO16-21

We recognize that there would be a long-term to permanent reduction of habitat for some migratory bird species. Section 4.5.3 of the EIS has been updated to include an assessment of Constitution's Preliminary Migratory Bird and Upland Forest Plan which includes measures protective of migratory birds. Migratory birds that prefer open herbaceous areas would experience an increase in habitat from construction and operation of the project.

CO16-22

As stated in section 4.6.1.4, displaced wildlife would be expected to seek refuge in adjacent, undisturbed habitats and return after completion of construction as vegetation restoration progresses. We believe that the restoration of the disturbed right-of-way should be the priority; however, we do recognize that some species may never recolonize the right-of-way to preconstruction levels.

CO16-23

See the response to comment CO16-9. The comment is noted.

COMPANIES AND ORGANIZATIONS

CO16 – Otsego County Conservation Association (cont'd)

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CO16-24	<p>Comments on Section 4.8 – Land Use, Recreation, Special Interest Areas and Visual Resources</p> <p>4.8.1.1 Environmental Setting This section addresses the variety of land use types that would be immediately affected by construction of the pipeline and facilities, either temporarily impacted by construction activities or permanently encumbered by these facilities once in operation. It should be noted here that any impacts on land use could have wide ranging and long lasting effects that go well beyond the immediately affected areas. For example, property values that decline due to pipeline construction and long-term operation, impacts on visual resources, perceived threat of possible environmental contamination, etc. could have a negative economic impact in surrounding communities, particularly for business districts within the Town and City of Oneonta in southern Otsego County. Conversely, short-term effects of construction activities could lead to an increase in traffic in these areas which may benefit local businesses but may also place increased pressure on local roads as a result of both increased customer traffic and truck traffic associated with construction.</p>
CO16-25	<p>4.8.4 – Recreation and Special Interest Areas This section leaves out locally-used recreational areas downstream of affected water bodies within the construction route, such as the Charlotte Creek at Fortin Park in the Town of Oneonta which serves as a recreational space and fishing area and would be subject to a variety of potential negative impacts from construction-related activities.</p>
CO16-26	<p>Comments on 4.9 – Socioeconomics</p> <p>4.9.1 – Population and Employment This section correctly assesses that construction would temporarily increase the population of counties in the general vicinity of the pipeline construction route. These effects may be particularly acute in Otsego County as the City of Oneonta is one of the largest population centers near the proposed route, especially in Delaware County and portions of other counties. In general, this may have a positive economic impact for local businesses. However, negative impacts may be realized in terms of increased traffic, increased pressure on public services and infrastructure, as well as temporarily decreasing the availability of housing as the EIS itself states.</p>
CO16-27	<p>4.9.5 – Property Values and Mortgages As mentioned above, construction activities and ongoing operations of the proposed pipeline and its facilities may impact affected properties by limiting the productivity and use of that land, thus resulting in some devaluation of affected properties. Although any impact to Otsego County of such possible property devaluation would likely be minimal, there is still a possibility that this could have some long-term impacts to Otsego County's local economy, particularly where Otsego County borders Delaware County.</p>

CO16-24	The potential impacts of the projects upon property values are discussed in section 4.9.5 of the EIS, and impacts on visual resources are discussed in section 4.8.6. Both of these sections have been updated with new information. See the response to the comment CO16-13 regarding traffic.
CO16-25	The FERC's guidance indicates that applicants identify recreational and special use areas that would be crossed and within 0.25 mile of a project. This distance provides adequate protection of the resources (FERC 2002). Fortin Park is approximately 2 miles from Constitution's proposed pipeline. Any increases in turbidity within Charlotte Creek would be short-term and dissipate before reaching the area at Fortin Park.
CO16-26	The EIS discusses impacts on housing (section 4.9.2) and social services (section 4.9.3). As stated in section 4.9.2, given the vacancy rates (4.2 percent to 8.3 percent) and the number of vacant housing units in the counties that would be affected by the project (41,975 in Pennsylvania and New York), construction crews should not encounter difficulty in finding temporary housing. At a maximum, the workforce would utilize about 2.5 percent of the vacant housing units.
CO16-27	We concluded that there is no evidence that the presence of a pipeline results in significantly decreased property values, particularly in counties not crossed by the project.

COMPANIES AND ORGANIZATIONS

CO16 – Otsego County Conservation Association (cont'd)

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CO16-28 | 4.11 – Air Quality and Noise

4.11.1.3 – Air Emission Impacts and Mitigation

This section addresses the mitigation of impacts due to pipeline construction: vehicle and equipment emissions and fugitive dust emissions from disturbing earth/roadways. The EIS goes on to state that emissions from the operation of the pipeline would be “negligible.” However, the Clean Air Council has raised concerns about natural gas transmission networks and claims that leaks of methane and hydrocarbons could produce “significant effects on air quality.”¹ The Clean Air Council cites one emissions survey in particular, from Texas’ Barnett Shale region, which showed that fugitive emissions from transmission networks accounted for 35% of total fugitive emissions from natural gas emissions.² Given these prior studies, what is the basis on which FERC has determined the potential emissions from the operation of the Constitution Pipeline to be negligible? Are there other findings that contradict evidence of high levels of fugitive emissions from natural gas transmission pipelines? Or is this because of newer technologies/procedures that Constitution Pipeline will be implementing?

CO16-29 | 4.11.2 – Noise

This section does not address additional noise that may be generated by truck traffic in and around Otsego County where construction-related vehicles will be using Interstate 88 through Otsego County to reach pipeline and pipeline facility construction sites south of Otsego County. More information is needed on the routes that will be used to bring equipment and workers to construction sites and the volume of such traffic to determine whether or not this may result in adverse noise impacts to Otsego County.

CO16-30 | Comments on 4.13 – Cumulative Impacts

4.13.1 – Marcellus Shale Development

The FERC EIS addresses the potential cumulative impacts of the proposed pipeline as it relates to the ongoing development of natural gas deposits in the Marcellus Shale formation within the affected areas of Pennsylvania and Central New York. If New York State approves natural gas drilling using the controversial method of high-volume hydraulic fracturing, or “fracking,” the Constitution Pipeline may serve as a conduit for future natural gas wells developed in Otsego County, encouraging that development, and facilitating the construction of multiple gas well interconnect and gathering facilities required to transport that gas to the pipeline. This could potentially lead to numerous cumulative impacts precipitated by the construction of the Constitution Pipeline which are not addressed. Going further, because this pipeline may play such an integral role in developing Marcellus Shale natural gas resources, it is appropriate to consider all direct, indirect and cumulative impacts of natural gas drilling as part of the potential cumulative impacts of the Constitution Pipeline project.

¹ Clean Air Council, *Re: Constitution Pipeline Company, LLC; Notice of Intent to Prepare an Environmental Impact Statement for the Planned Constitution Pipeline Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meetings*, PF12-9-0000 (Oct 10, 2012);

² Al Armendariz, *Emissions from Natural Gas Production in the Barnett Shale Area and Opportunities for Cost-Effective Improvements* (Armendariz Report), 2009, Pg. 20

CO16-28 Section 4.11.1 of the EIS has been revised to include an expanded discussion of fugitive emissions.

CO16-29 Impacts on traffic and main roads that would be used for project purposes are discussed in section 4.9.4 of the EIS. Generally, main roads leading from contractor yards to the construction right-of-way, and public and private roads in the immediate vicinity of the construction right-of-way would provide most of the access for the project. The exact routes and usage are uncertain and would be variable. Given the existing traffic and noise along these roads, additional noise from project-related traffic is expected to be negligible. Furthermore, construction vehicles would be traveling during daytime hours, avoiding evening and night-time hours when noise receptors are most sensitive.

CO16-30 See the response to comment LA1-4.

COMPANIES AND ORGANIZATIONS

CO16 – Otsego County Conservation Association (cont'd)

S-271

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CO16-31 4.13.4 – Other Projects

The EIS references an agreement between Constitution and Leatherstocking Gas to construct interconnects and supply new markets along the proposed pipeline route. However, at the time this EIS was being performed there were no specific plans underway. Therefore, the cumulative impact with regard to this aspect is difficult to identify. How will Otsego County fit into these plans? Will Leatherstocking Gas attempt to construct pipelines connecting the Constitution Pipeline as it crosses Delaware County into markets in Otsego County?

CO16-31 See the response to comment FA6-15.

CO16-32 4.13.5.2 – Water Resources

The EIS states that pipeline and facilities construction will have only minor and temporary cumulative impacts on groundwater, wetlands, and water bodies due mainly to the clearing of vegetation, excavation, and dewatering of trenches and handling of hazardous materials. However, this assumes that both recommended and proper procedures for construction activities (particularly in wetlands and water bodies) and handling hazardous materials will be regularly observed and only violated in cases of accidents. How will specific recommendations and general applicable laws be enforced? Further, as these affected water bodies form part of the

CO16-32 See the response to comment LA10-1. The FERC staff would conduct regular field inspections during construction to enforce any condition or requirement imposed by the Commission on Constitution. Additionally, the EI will be responsible for ensuring the company is in compliance with all other relevant permit requirements.

Susquehanna River Watershed, which leads into Otsego County, will officials and members of the public in Otsego County have ready access to monitoring reports of these construction activities?

CO16-33 As described in section 2.5.3 of the EIS, third-party compliance monitors under the direction of the FERC would be used to monitor construction activities. Both Constitution and the FERC monitors would complete inspections on a daily basis and would have stop-work authority. Copies of the FERC monitors' weekly summary reports would be available on our eLibrary system at www.ferc.gov.

CO16-34 A further concern is that the cumulative effects of the Constitution Pipeline and natural gas drilling could have long-term, large-scale harmful effects on the overall Susquehanna River watershed and Chesapeake Bay. The Susquehanna River flows 444 miles from Otsego Lake in Otsego County through New York, Pennsylvania and Maryland to the Chesapeake Bay and forms a drainage basin with a population of 4 million people.³ As such, Otsego County is part of a much larger watershed community and we wish to ensure that activities in or near Otsego County do not negatively impact other communities with whom we share access to the resources of the Susquehanna River watershed.

CO16-34 As stated in section 4.13.6.2 of the EIS, the cumulative effect on groundwater and surface waterbody resources would be temporary and minor.

CO16-35 4.13.5.8 – Socioeconomics-Transportation and Traffic

In this section the EIS addresses the cumulative impact of increased truck traffic generated by construction of the pipeline and its associated projects. The EIS finds that the project would not have any long-term impact on transportation infrastructure. However, this determination seems questionable given the lack of data provided. The EIS doesn't even attempt to obtain a rough estimate of the amount of daily, weekly or monthly truck trips that may be expected for a given area. Therefore it is extremely difficult to accept the determination that truck traffic will not have significant cumulative impacts on the transportation infrastructure.

CO16-35 See the response to comment LA1-1.

CO16-36 Further, the EIS relies on a claim made by Constitution that truck traffic will utilize major highways (I-88 in Otsego County's case) and the construction right-of-way itself as much as possible to avoid using local roads. In cases where using the right-of-way is not possible, how much traffic is to be expected on local roads? What impact might this traffic have on the quality and maintenance of these local roads? These questions should be of particular interest to Otsego County as trucks may need to exit Interstate 88 in Otsego County and utilize local Otsego

CO16-36 The commentor's statement regarding traffic is noted. Given that the exact routes and usage would be uncertain and variable, it is impossible to estimate how many truck trips would be required during construction of the projects. It is reasonable to assume that truck traffic would range from moderate to heavy over the course of approximately 9 to 12 months, although traffic may decrease over time, at least in certain segments, as delivery of pipe, supplies, and equipment is accomplished. Given the existing use of I-88 by heavy trucks, construction of the projects would not be expected to damage I-88. As stated in section 4.9.4.1 of the EIS, Constitution would repair any roads damaged by the pipeline project.

³ Susquehanna River Basin Commission, *Information Sheet*, [http://www.srbcc.net/pubinfo/docs/Susa%20River%20Basin%20General%20\(05-13\).PDF](http://www.srbcc.net/pubinfo/docs/Susa%20River%20Basin%20General%20(05-13).PDF)

COMPANIES AND ORGANIZATIONS

CO16 – Otsego County Conservation Association (cont’d)

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CO16-36
cont'd

County roads to reach construction sites in Delaware County. Further information is needed as to the amount of traffic this project may generate so that affected municipalities would have the opportunity to enter into road use agreements with Constitution to help mitigate the added maintenance costs necessitated by this traffic. Further, how much wear and tear might Otsego County expect to see on Interstate 88 itself as a result of this truck traffic? As I-88 is a critical transportation asset for Otsego County, increased wear and tear and congestion could negatively impact Otsego County.

CO16-37

4.13.6 – Conclusion
We disagree with the conclusion of the EIS that the “majority of cumulative impacts would be minor and temporary” mainly because this determination was reached without a wider scope of focus on areas outside of the proposed construction sites. In order to properly assess both direct and cumulative impacts and determine appropriate mitigation measures, the EIS needs to address these impacts on communities outside of immediately affected construction sites, particularly as they relate to Otsego County where these construction sites will be near the Otsego County border and where they impact wetlands and water bodies that serve the Susquehanna River Watershed that runs through Otsego County.

CO16-37

The geographic and temporal scope of the cumulative impacts assessment are described at the beginning of section 4.13 of the EIS, including broader consideration for resources such as watersheds and air quality control regions.

COMPANIES AND ORGANIZATIONS

CO17 – Lilac Hill Farm

20140331-5002 FERC PDF (Unofficial) 3/29/2014 6:21:51 AM

- Lilac Hill Farm, Unadilla, NY.
- CO17-1 We are a seven person family living on 130 acres one half mile away from the proposed Constitution Pipeline. We practice Organic and Biodynamic farming with a herd of Finn Corriedale Ramboulet sheep. In addition we have a farm vacation business and sell wool products at local Farmers Markets in Delaware and Otsego Counties. Our business will suffer as a result of this pipeline. This is certainly the case in the short run while roads and streams on adjacent properties are directly affected, our home will be also by trucks, noise and lights and redirected traffic.
- CO17-2 I fear that my neighbors not directly on the proposed route and the alternate routes are uninformed and unaware of this project and the effect it will have on the property they own, on their safety and their future use and enjoyment. All residents should be directly notified within the two plus mile wide explosion zone for a pipeline of this size and pressure. And what if the pipeline is run at maximum pressure in the future? Shouldn't that explosion zone and the notifications be widened too? Perceived dangers and pollution will also diminish our business as all pipelines and also High Volume High Pressure Hydrofracking as reported in the media make target areas like my town of Sidney NY less attractive. Families don't want to vacation or bring children to industrial locations.
- CO17-4 My neighbor and I attended Pipeline Safety meetings for two years where our feelings of protection from accidents and explosions were not allayed but magnified. We sat with Volunteer Firefighters and Volunteer Emergency Crews who were advised that escaping gas had no odorant to warn people of leaks, and that the explosion zone from invisible gas clouds could be miles wide. They were advised to run away on foot faced into the wind and not start a vehicle which could induce an explosion. While there are automatic turn off valves from remote locations, sometimes manual turn offs are necessary and only pipeline personnel can do this. Are any of these turn off valves in the flood zones? This is an enormous burden for volunteer crews who want to protect residents but are at increased risk for themselves and are being burdened with responsibility for this added danger for all residents.
- CO17-5 The DEC is correct in requiring a complete build out for HVHF methane extraction be studied along this line as well. Consequently we must state our complete opposition for this pipeline as a conduit for local fracking, collection lines, compressor stations, gas storage, and cracking plants. All pipelines loose compression pressure over time we learned at early meetings from Williams pipeline representatives. Why are there no compression station locations listed on the plans? This lack of transparency should alert residents to the omissions that FERC and surely Williams and Cabot are aware of that will further harm people and property.
- Lilac Hill Farm, Sidney, N.Y.

- CO17-1 Traffic is discussed in section 4.9.4 of the EIS. As stated in section 4.9.4.1, Constitution would repair any roads damaged by the pipeline project. As stated in section 4.11.2.3, most construction activities would be limited to the daytime hours which would limit noise and lighting impacts, and given that this commentor's property is 0.5 mile away from construction, these impacts would be small or unnoticeable.
- CO17-2 As stated in section 2.7 of the EIS, Constitution would need additional FERC authorization to increase the pressure and/or transport volumes beyond those stated in the EIS. As outlined in the Commission's regulations at 18 CFR § 157.6(d), the Applicants are required to notify all landowners that would be directly affected, about a proposed workspace, or would be within 1 mile of a proposed compressor station. The FERC's mailing list includes the Applicants' mailing list (as described previously) as well as anyone that has requested to be included or has filed a comment containing their mailing address.
- CO17-3 Potential impacts and mitigation on tourism are discussed in the EIS in section 4.9.2. See the response to comment LA1-4 regarding high volume hydraulic fracturing.
- CO17-4 A discussion of pipeline safety is included in section 4.12 of the EIS. As stated in section 4.12.1, the proposed pipeline would utilize remote-controlled valves, rather than manually operated valves. These valves would be controlled remotely by Constitution's staff rather than local emergency response personnel. Because they are remotely operable, any flooding would not preclude their shut-off.
- CO17-5 High volume hydraulic fracturing and well development is discussed in the response to comment LA1-4 and the development of the Marcellus Shale is discussed in the response to comment CO3-1. The Constitution pipeline would be connected to existing compressor stations at the beginning and end of the route. The EIS discusses the impacts of the modifications that would be required at Iroquois' Wright Compressor Station.

COMPANIES AND ORGANIZATIONS

CO18 – Leatherstocking Gas Company LLC

	<p style="text-align: center;">UNITED STATES OF AMERICA BEFORE THE FEDERAL ENERGY REGULATORY COMMISSION</p> <p>Constitution Pipeline Company LLC) FERC Docket No. CP13-499-000 <i>et al.</i></p> <p style="text-align: center;">ANSWER OF LEATHERSTOCKING GAS COMPANY LLC IN OPPOSITION TO MOTION FOR EXTENSION OF TIME</p> <p>CO18-1 Pursuant to Rule 213 of the Federal Energy Regulatory Commission’s (“Commission’s”) Rules of Practice and Procedure, 18 C.F.R. § 385.213, Leatherstocking Gas Company LLC (“Leatherstocking”) hereby files this Answer in Opposition to the Motion for Extension of Time filed with the Commission on March 24, 2013, by the New York State Department of Environmental Conservation (“NYSDEC”) in which the NYSDEC seeks an extension of the comment period for the Draft Environmental Impact Statement (“DEIS”) submitted on behalf of Constitution Pipeline Company, LLC (“Constitution”) and Iroquois Gas Transmission System, LP (collectively, the “Applicants”) in the above-referenced proceeding. To the extent that NYSDEC seeks an extension of time in which to comment on matters that relate solely to distribution-related facilities, its request should be denied. In support of this Answer, Leatherstocking asserts as follows:</p> <p style="text-align: center;">I. BACKGROUND</p> <p>Leatherstocking is an intervenor and supporter of the proposed Constitution Pipeline. On February 12, 2014, the Commission issued the Draft Environmental Impact Statement (“DEIS”). The Commission established April 7, 2014 as the comment date for those interested in commenting on the DEIS. The Commission also established procedures and meeting dates so that the public could provide comments in oral form.</p> <p>14919165.4</p>
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CO18-1 The commentor’s statements regarding the NYSDEC’s request for an extension of time is noted.

COMPANIES AND ORGANIZATIONS

CO18 – Leatherstocking Gas Company LLC (cont'd)

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CO18-1
cont'd

On March 24, 2014, NYSDEC filed a motion for extension of time, seeking additional time in which to provide comments. NYSDEC seeks such extension “to allow Applicants time to submit all outstanding information by April 30th and to provide parties adequate time to review and provide comment on the revised DEIS by May 30th.” According to NYSDEC, the additional time is necessitated by “numerous outstanding studies; the volume of material in the DEIS; and limited information pertaining to the Applicants’ agreements to deliver natural gas to communities along the proposed route.” None of these reasons warrants the delay sought by NYSDEC and, accordingly, Leatherstocking Gas opposes this request.

II. ARGUMENT

Leatherstocking Gas believes that the Applicants are in the best position to address NYSDEC’s rationale pertaining to “studies” and “volume of material.” Accordingly, in this response, the Company will focus on NYSDEC’s third reason pertaining to the delivery of natural gas to communities along the route. NYSDEC essentially seeks additional time to comment on matters that are clearly outside of the jurisdiction of the Commission, specifically, the environmental and related effects of any distribution facilities that may be constructed along the interstate pipeline route.

NYSDEC’s rationale suffers from an obvious and fatal error. As stated by NYSDEC, “NYSDEC staff is concerned that the additional plans for local gas distribution represent a significant expansion of the scope of the proposed project and . . . this information should be presented in a revised DEIS and made available for review and comment by all parties.”¹ “Local gas distribution,” however, is not a part of the project before the Commission – nor could it be.

¹ Letter at 2 (footnote omitted).

COMPANIES AND ORGANIZATIONS

CO18 – Leatherstocking Gas Company LLC (cont’d)

CO18-1
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As a threshold matter, the local distribution facilities with which NYSDEC purports to be concerned are not within the Commission’s jurisdiction. The Natural Gas Act (“NGA”) expressly excludes such facilities: “The provisions of this chapter . . . shall not apply to . . . the local distribution of natural gas or to the facilities used for such distribution”² Moreover, the “Applicants” are not proposing to construct local distribution; Leatherstocking Gas, an unaffiliated prospective customer, is. Any local distribution facilities and operations ultimately proposed by Leatherstocking Gas will be subject to full regulation by the New York State Public Service Commission (“NYSPSC”) – including environmental review of construction plans – not by this Commission. Any concerns NYSDEC may have about the distribution system can be fully explored in proceedings before the NYSPSC.

A useful example of the scope and depth of the NYSPSC’s review of proposed service area expansions is found in the relatively recent application to the NYSPSC by Corning Natural Gas Corporation, a distribution affiliate of Leatherstocking Gas, to serve portions of the Town of Virgil, Cortland County, New York. The NYSPSC Order Granting a Certificate of Public Convenience and Necessity, issued June 19, 2009 in Case 09-G-0252, illustrates the detailed environmental review the NYSPSC undertakes pursuant to the State Environmental Quality Review Act in the course of determining whether to authorize the exercise of a gas distribution franchise pursuant to Section 68 of the New York Public Service Law. As evidenced by the aforementioned Order,³ the applicant must file detailed information on the potential environmental impact of the installation of the distribution system and the NYSPSC performs a detailed review of the proposed project, including discovery and field investigation. In addition,

² NGA §1(b) (15 U.S.C. §717(b)).
³ The Order can be viewed on the NYSPSC website:
<http://documents.dps.ny.gov/public/Common/ViewDoc.aspx?DocRefId={CF4DF4ED-B25B-41EA-AC71-AF8125DD7C69}>

COMPANIES AND ORGANIZATIONS

CO18 – Leatherstocking Gas Company LLC (cont’d)

CO18-1
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as illustrated by the Order, the review and permitting process is one in which NYSDEC participates actively in carrying out its statutory responsibilities.⁴ The process is thorough and represents a rigorous exercise of state jurisdiction that does not require duplication at the federal level.⁵ While NYSDEC’s effort to “federalize” the planning and construction of local distribution facilities and force the Commission to devote its resources to such matters is indeed creative, it has no relationship to the reality of what is permitted, much less required, to be considered in this case.⁶

Although the siting and construction of interconnection facilities, once identified specifically, along the proposed pipeline may be appropriate objects of review by the Commission, that does not mean that review of whatever may eventually be connected to them downstream of the pipeline⁷ is either within the jurisdiction of the Commission or necessary to the exercise of the Commission’s responsibilities in this proceeding. While Leatherstocking Gas intends to construct facilities to serve the Village and Town of Sidney and is considering expansion to other potential service areas, it has not yet performed the engineering, specific routing analyses or identification of optimal interconnection points necessary for such development. If Leatherstocking Gas proceeds with the proposed distribution system, it will perform all the necessary work and make all the necessary filings to enable the NYSPSC to carry out its review function – a process that would include participation by NYSDEC as to any

⁴ See, e.g., Order at 7-8.

⁵ The Town of Virgil case is also instructive in that the new local distribution system in that instance was also being constructed directly off the DTI pipeline; yet the Commission was neither required, nor apparently found it necessary, to engage in review of the impact of the new distribution system on the entities and facilities under its jurisdiction.

⁶ The same is, of course, true of NYSDEC’s citation of the Amphenol project (Letter at 2, fn.2). What the “terms of Delaware County IDA grant to fund the feeder line to Amphenol” have to do with any legitimate issue in this case is simply a mystery. In any event, the line to be constructed to serve Amphenol is a *distribution* line, not a “feeder” for an interstate pipeline.

⁷ Leatherstocking Gas intends to construct and own everything downstream of the interconnection point; that is, the gate station, metering equipment and all distribution pipe. Leatherstocking Gas has no plans to add compression. The pipe itself will be plastic and Leatherstocking Gas has no plans to use it for transmission or gathering from local wells.

COMPANIES AND ORGANIZATIONS

CO18 – Leatherstocking Gas Company LLC (cont’d)

CO18-1
cont'd

subjects within its subject matter responsibilities. Moreover, given the relatively small proportion of the proposed pipeline's throughput that would be represented by Leatherstocking Gas customer load,⁸ it is even more difficult to give credence to NYSDEC's claim that "additional plans for local gas distribution represent a significant expansion of the scope of the proposed project." It is also difficult to imagine how the Commission could ever complete its review or, for that matter, how any pipeline project could be certificated if, any time a project is proposed, the applicant and the Commission had to examine, in the detail suggested by NYSDEC, the environmental and other attributes of any distribution system or distribution customer that might interconnect with the proposed facility.

The law, the facts and sound policy simply do not support the relief NYSDEC demands. Its Motion for Extension of Time, therefore, should be denied.

⁸ To provide some perspective, Leatherstocking Gas has estimated that throughput for the Village and Town of Sidney would be less than 1,000 Mcf/day even when the distribution system is fully built out. This amount is approximately 0.3% of the total Constitution throughput and, therefore, should have no impact on the scope of the pipeline. Even if the other distribution facilities that could follow the Sidney system are constructed, the total throughput for all Leatherstocking Gas distribution, including Sidney, would be in the range of 2,000 Mcf/day or approximately 0.6% of Constitution's total throughput. As with the smaller amount, even that amount would not impact the scope of the Constitution facilities.

COMPANIES AND ORGANIZATIONS

CO18 – Leatherstocking Gas Company LLC (cont’d)

CO18-1
cont'd

WHEREFORE, Leatherstocking respectfully requests that NYSDEC’s Motion for Extension of Time be denied.

Respectfully submitted,

Stanley W. Widger, Jr.

Stanley W. Widger, Jr.
Elizabeth W. Whittle
Counsel to
Leatherstocking Gas Company LLC

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ewhittle@nixonpeabody.com

Dated: March 31, 2014

CERTIFICATE OF SERVICE

I hereby certify that I have this day served the foregoing document on each party listed on the Official Service List compiled by the Secretary in this proceeding.

Dated in Washington, DC this 31st day of March, 2014.

Elizabeth W. Whittle
Elizabeth W. Whittle

COMPANIES AND ORGANIZATIONS

CO19 – National Grid Gas Delivery Companies

John V. Vaughn
Vice President
Energy Procurement

nationalgrid

March 31, 2014

Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
888 First Street, NE
Washington, DC 20426

RE: Constitution Pipeline Company, LLC - FERC Docket No. CP13-499

Dear Ms. Bose,

On behalf of the National Grid Gas Delivery Companies,¹ I am writing to confirm our continued support for Constitution Pipeline Company, LLC (“Constitution” or “Project”) and to request that the Commission act expeditiously in issuing necessary regulatory approvals to enable the Project to meet a 2015 in-service date. Although the National Grid Gas Delivery Companies have not entered into precedent agreements to purchase firm transportation capacity that will be created by Constitution, we recognize the significant public benefits provided by the Project.

The National Grid Gas Delivery Companies distribute natural gas to more than three million gas customers in the states of New York, Rhode Island and Massachusetts. Constitution proposes to provide 650,000 dekatherms per day of firm natural gas transportation capacity from receipts in Susquehanna Country, Pennsylvania, for delivery into points of interconnection with Iroquois Gas Transmission System, L.P. and Tennessee Gas Pipeline Company, L.L.C., at Wright, New York. The project will provide access to new sources of gas supply being developed in North Central Pennsylvania from shale deposits and will enhance the overall reliability and diversity of energy

¹ The National Grid Gas Delivery Companies are intervenors in these proceedings and consist of the Brooklyn Union Gas Company d/b/a National Grid NY; KeySpan Gas East Corporation d/b/a National Grid; Boston Gas Company, Colonial Gas Company, collectively d/b/a National Grid; Niagara Mohawk Power Corporation d/b/a National Grid; and The Narragansett Electric Company d/b/a National Grid, all subsidiaries of National Grid USA, Inc.

CO19-1

The commentor’s statements in support of the proposed projects are noted.

COMPANIES AND ORGANIZATIONS

CO19 – National Grid Gas Delivery Companies (cont'd)

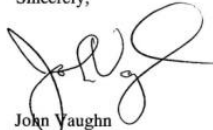
CO19-1
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infrastructure in the northeastern United States. Further, this increased production will provide economic benefits to the region by increasing competition among fuel sources.

Projects like Constitution are critical to meeting the growing demands of natural gas customers. Moreover, the introduction of this new supply and capacity will not only support future economic development and enhance reliability, but will help to relieve capacity constraints into the northeast markets and, as a result of the increased infrastructure to transport supplies, should help to reduce volatility of spot market gas prices in the territories served by the National Grid Gas Delivery Companies.

Recently, the Commission's Staff issued a draft Environmental Impact Statement for the Project in which it concluded that the construction and operation of Constitution would result in limited adverse environmental impacts. These limited adverse impacts are far outweighed by the benefits of the Project. The record in these proceedings overwhelmingly demonstrates that the Project is in the public convenience and necessity and warrants the Commission's approval. For this reason and the reasons mentioned above, we urge the Commission to issue the necessary regulatory approvals to ensure construction may proceed and service on Constitution may commence in a timely manner.

Sincerely,



John Vaughn
Vice President, Energy Procurement
National Grid


cc: Service List

S-281

COMPANIES AND ORGANIZATIONS

CO20 – Independent Power Producers

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www.ippony.org
Gavin J. Donohue, President &
Chief Executive Officer

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FEDERAL ENERGY
REGULATORY COMMISSION

March 25, 2014

Secretary Kimberly D. Bose
Federal Energy Regulatory Commission
888 First Street, NE, Room 1A
Washington, D.C. 20426

Re: Proposed Constitution Pipeline Project, FERC Docket No. CP13-499-000

Dear Secretary Bose:

CO20-1 I am writing on behalf of the Independent Power Producers of New York (IPPNY). We understand that the Federal Energy Regulatory Commission (FERC) recently issued its draft Environmental Impact Statement (DEIS) related to the Constitution Pipeline Project. Further, we are advised that FERC is currently accepting public comments related to the DEIS. IPPNY submits this letter in accordance with the public comment period.

IPPNY urges FERC to strongly consider the impact increased capacity of natural gas will have in New York, including upon power production, potential cost savings to users and other economic benefits to the region. As proposed, the Constitution Pipeline will increase the supply of natural gas produced in Pennsylvania to the New York City -area and to New England markets. The increased supply of natural gas to New York and beyond, could benefit power producers and industrial, commercial and residential users with more economical and abundant sources than those derived from distant gas fields, including in Canada. During January 2014, for instance, the spot market price for natural gas in the New York City region exceeded \$120 per thousand cubic feet; while the same supply of gas in nearby Pennsylvania – was a fraction of that cost, approximately \$5. IPPNY generally supports initiatives that provide low-cost energy sources that assist our members in providing economical energy to our customers.

IPPNY also supports the increased economic benefits associated with natural gas infrastructure development, since it contributes to a vibrant economy that is good for everyone. The workers who construct and maintain natural gas pipelines, the increase in local economic activity, and the enhanced tax revenues received by host municipalities and school districts, are all hallmarks of the energy sector doing its part to improve New York's economy, and IPPNY supports such initiatives.

Board of Directors
Astoria Energy, LLC ■ Brookfield Renewable Energy Group ■ Brooklyn Navy Yard Cogeneration Partners ■ Calpine Corporation
Caithness Long Island, LLC ■ Dominion ■ Dynegy, Inc. ■ Entergy Corporation ■ EquiPower Resources Corp. ■ Exelon Corporation
First Wind ■ Invenergy, LLC ■ GDF SUEZ Energy North America ■ New Athens Generating Company, LLC
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Selkirk Cogen Partners, LP ■ TC Ravenswood, LLC ■ US Power Generating Company

CO20-1

The commentor's statements in support of the proposed projects are noted.

COMPANIES AND ORGANIZATIONS

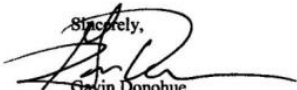
CO20 – Independent Power Producers (cont'd)

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Established in 1986, IPPNY is the largest energy trade association in the state representing over 65 companies in the electric power supply industry. Member companies generate over 75 percent of the state's electricity using a wide variety of generating technologies and fuels including hydro, nuclear, wind, coal, oil, natural gas, biomass, energy-from-waste, and landfill gas. IPPNY Members do more than just meet New York's energy demands; they benefit the economies of the communities they serve, including investments of over \$10 billion to purchase, construct, and operate their facilities, employment of more than 10,000 individuals, payment of annual taxes of over \$600 million, and the investment of more than \$50 million in their host communities.

If you have any questions, please do not hesitate to contact me.

Sincerely,

Gavin Donohue
President & CEO

COMPANIES AND ORGANIZATIONS

CO21 – Board of Cooperative Educational Services

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UNITED STATES OF AMERICA FEDERAL ENERGY REGULATORY COMMISSION			
Constitution Pipeline Company, LLC Iroquois Gas Transmission System, L.P.	Docket No. CP13-499-000 Docket No. CP13-502-000		
CO21-1	<p><u>MOTION TO INTERVENE ON BEHALF OF THE CAPITAL REGION BOARD OF COOPERATIVE EDUCATIONAL SERVICES</u></p> <p>Pursuant to Rule 214 of the Commission's Rules of Practice and Procedure [18CFR Section 385.214], the Capital Region Board of Cooperative Educational Services hereby moves the Federal Energy Regulatory Commission for an order granting it party status in the above-captioned proceeding. The persons to whom communication regarding this Motion should be addressed and upon whom service of all pleadings or other documents in this proceeding should be made are:</p> <table><tr><td>John J. Privitera, Esq. McNamee, Lochner, Titus & Williams, P.C. 677 Broadway, Suite 500 Albany, New York 12207 Phone: 518-447-3337 privitera@mltw.com</td><td>Michele V. Handzel Esq. Capital Region BOCES 900 Watervliet Shaker Road, Suite 102 Albany, New York 12205 Phone: 518-464-5139 Michele.handzel@neric.org</td></tr></table> <p>As grounds for its Motion to Intervene, Movant respectfully asserts:</p> <p><u>ALBANY-SCHOHARIE-SCHENECTADY-SARATOGA BOARD OF COOPERATIVE EDUCATION SERVICES</u></p> <p>1. The Movant Albany-Schoharie-Schenectady-Saratoga Board of Cooperative Educational Services ("Capital Region BOCES"), is a public educational service agency serving the school districts in the Counties of Albany, Schoharie, Schenectady and Saratoga in the State of New York. The Movant provides educational leadership, services and support to meet the</p>	John J. Privitera, Esq. McNamee, Lochner, Titus & Williams, P.C. 677 Broadway, Suite 500 Albany, New York 12207 Phone: 518-447-3337 privitera@mltw.com	Michele V. Handzel Esq. Capital Region BOCES 900 Watervliet Shaker Road, Suite 102 Albany, New York 12205 Phone: 518-464-5139 Michele.handzel@neric.org
John J. Privitera, Esq. McNamee, Lochner, Titus & Williams, P.C. 677 Broadway, Suite 500 Albany, New York 12207 Phone: 518-447-3337 privitera@mltw.com	Michele V. Handzel Esq. Capital Region BOCES 900 Watervliet Shaker Road, Suite 102 Albany, New York 12205 Phone: 518-464-5139 Michele.handzel@neric.org		
{M07741481}			

CO21-1 The commentor's statements regarding the Capital Region Career and Technical School are noted.

COMPANIES AND ORGANIZATIONS

CO21 – Board of Cooperative Educational Services (cont'd)

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CO21-1
cont'd

needs of students in the four county area and the school districts therein. The Movant is the sixth largest Board of Cooperation Educational Services ("BOCES") in New York State, and delivers more than 300 educational and administrative services to its 23 component school districts and to the City School District of Albany. Capital Region BOCES was formed in 1953 to serve these districts and it employs about 1,100 staff members who provide a wide range of services.

2. Career and technical education is one of the divisions of Capital Region BOCES. The career and technical education division includes three campuses. One of these campuses, the Capital Region Career and Technical School, is located at 174 State Route 30A, Schoharie, New York. The Schoharie campus (the "School") will be directly impacted by this proposed pipeline project.

3. The School is on a parcel of land that is about 63 acres in size. Over 200 students are enrolled in various programs at the School, which provides focused studies and degrees in eight programs. The facility was custom built in 1972 so as to provide a specialized curriculum in two of these eight program areas: commercial construction and heavy equipment; and, residential construction and heavy equipment. Approximately 60 students are enrolled in the two construction/heavy equipment programs at the School, whose continuity and viability are threatened by this proposed project.

4. On any given school day, approximately ten pieces of heavy equipment are in operation at the School in outdoor classes, including two backhoes, two bulldozers, two excavators, a farm tractor, a skid steer, a dump truck and trailer, and a roller. Other outdoor construction training includes the use of various compactors, chainsaws and rigging, hauling and logging activities. Students learn to operate each piece of equipment, engaged in digging, trenching, earth moving, compaction, tree felling and other heavy equipment activities. Outdoor

{M07741481}

COMPANIES AND ORGANIZATIONS

CO21 – Board of Cooperative Educational Services (cont'd)

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CO21-1
cont'd

topics of study include workplace safety and management, tools use and maintenance, site development, layout, blue prints and codes, soils identification, structures, utilities, concrete and form construction, rough framing, as well as operation and preventive maintenance of compaction equipment, backhoes, bulldozers and excavators.

5. As clearly shown in Exhibit A hereto, the Schoharie campus of the School is fully used and occupied, from the bus loop, School building, maintenance buildings and outdoor class rooms, all the way to the edge of the property along Route I-88.

6. Although the parcel of land upon which the Schoharie campus of the School is located is 63 acres, approximately 50% of that acreage is not usable by the School because the parcel is bisected by a flood-prone creek and associated deep gorge running north to south and then under State Route 30A. The creek and gorge cannot be crossed by heavy equipment and therefore, the easterly half of the acreage is not capable of being used as a portion of the outdoor classroom. Thus, the usable acreage is only about 30 (thirty) acres, of which about 7 (seven) acres are buildings and lots. All of this outdoor, useable acreage, about 23 acres, is used in the School's curriculum at the Schoharie campus.

7. The highly specialized, unique elements of the School's Schoharie campus are irreplaceable elsewhere. The custom School building contains features that are not found in other school buildings including several large storage bays with overhead doors for the ten pieces of heavy equipment; large classrooms with vaulted ceilings where operation and maintenance of the heavy equipment can be taught indoors; and, specialized storage areas for safety equipment and outdoor gear.

8. The outdoor teaching areas have taken years to develop and construct. These areas include well established earthen features, including berms, inclines and ponds, where the

{M07741481}

COMPANIES AND ORGANIZATIONS

CO21 – Board of Cooperative Educational Services (cont'd)

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CO21-1
cont'd

different functions and operational modes of heavy equipment can be taught in a controlled, safe, instructional setting.

9. The School is also located on an established bus route, so it can be served by a broad geographic region which is necessary to the missions of Capital Region BOCES and the School.

10. The School is not for sale. The pipeline company proposes to take, through condemnation proceedings, 5.6 acres of the approximately 23 acres of useable outdoor classroom area. The pipeline company's forceful taking of 20-25% of the School's outdoor classroom area will destroy the curriculum, as there is simply no substitute for the teaching acreage that will be lost.

CO21-2

THE DEIS IS INADEQUATE TO SUPPORT A TAKING OF THE SCHOOL

11. The DEIS acknowledges that the environmental impact analysis of this proposed pipeline project is incomplete and therefore requires a further, publicly available environmental impact analysis with respect to avoidance measures and impacts upon the School. Specifically, the DEIS finds:

The safety and welfare of the students was the primary concern raised by the commentators. We requested information from Constitution regarding the crossing of this property, but it is not clear when and how the school would be impacted.

DEIS § 4.8.4, page 4-129.

12. Indeed, the DEIS finds that the Commission has already documented unmitigated and unavoids impact on the School: "The pipeline route would cross the parcel owned by the School and in an area where excavation and construction activities are being conducted as part of the School's curriculum." Id.

{M0774148.1}

CO21-2

The commentator's statements requesting intervenor status are noted. The Commission will make a determination on whether to grant a party's intervention request. The property, as well as potential conflicts in land use and student safety and our recommendation for safety fencing, is discussed in sections 3.4.3 and 4.8 of the EIS.

COMPANIES AND ORGANIZATIONS

CO21 – Board of Cooperative Educational Services (cont'd)

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CO21-2 cont'd	<p>13. The Commission's findings in the DEIS are carried forward to the conclusions and recommendations of that document. Specifically, FERC staff's recommended mitigation with respect to the School is as follows:</p> <p>Prior to construction, Constitution shall coordinate with the Schoharie Career and Technical Education School, Board of Educators, and file with the secretary for the review and written approval of the director of OEP, impact avoidance, minimization, or mitigation measures designed to ensure that the pipeline and access road PAR73a (near MP120.6) do not conflict with or hinder the school's ability to implement current or future curriculum activities.</p> <p>DEIS § 5.2, Finding No. 41, page 5-23.</p> <p>14. These findings establish that the DEIS cannot survive scrutiny. Known impacts must be avoided and the avoidance mechanisms must be documented for the public within the DEIS itself; leaving these tasks for later is insufficient as a matter of law.</p> <p>15. These documented findings in the DEIS alone establish that Capital Region BOCES' participation in the proceeding as an intervenor is necessary and in the public interest of protecting the School's resources. These findings also establish that the School represents a scholastic and academic interest that will be directly affected by the outcome of this proceeding. For these reasons, Capital Region BOCES should be granted party status pursuant to 18 CFR § 385.214(b).</p>
CO21-3	<p>16. The DEIS is insufficient as a matter of law because it does not evaluate or assess a minor route deviation that would put the pipeline beyond the School's Schoharie campus, either within the I-88 corridor or through some other pathway. Although the Commission has directed the pipeline company to assess minor route deviations to protect other special land uses such as water wells and mines, no effort is made in the DEIS to avoid or protect the School's academic resources.</p>
{M07741481}	

CO21-3

In section 4.8.4.3 of the draft EIS we recommended that Constitution coordinate with the Schoharie Career and Technical Education School Board of Educators to develop impact avoidance, minimization, or mitigation measures designed to ensure that the pipeline would not hinder the school's ability to implement current or future curriculum activities. On March 14, 2014, Constitution proposed a re-route of the pipeline on school property. On April 7, 2014, Constitution eliminated the access road it initially requested to locate on the school property. Our assessment of Constitution's proposed re-route is discussed in section 3.4.3 of the EIS.

COMPANIES AND ORGANIZATIONS

CO21 – Board of Board of Cooperative Educational Services (cont'd)

S-289

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CO21-4	17. The DEIS fails to acknowledge that the School is a high consequence area that ought to be avoided because at any given point in time there could be over 200 people on campus, including dozens of students outside near or along the pipeline, using heavy equipment.
CO21-5	18. The proposed location of the pipeline, within a school that trains young students in the use of heavy equipment, will intimidate the students and teachers, raise concern among parents, restrict academic freedom, stigmatize the School and will thus have a socioeconomic impact upon the public services provided by the School. The DEIS does not take a hard look at these impacts.
	19. The DEIS fails to scrutinize, assess or even consider the geotechnical impact of students operating ten pieces of large heavy equipment in proximity to the pipeline, including trenchers and compactors. The Schoharie campus of the School is a heavily used, dynamic environment. It is not a static land use. Ongoing, future impacts from the geotechnical force of the heavy equipment in proximity to the proposed pipeline must be scrutinized before the DEIS is deemed complete as a matter of law.
	20. The DEIS specifically notes that the School's outdoor heavy equipment training grounds are a "special interest area," see DEIS § 4.8.4, but fails to document why the area could not be avoided.
CO21-6	21. As noted in the DEIS, the pipeline company's access road for the project across the School property has not been closely scrutinized as required by the National Environmental Policy Act, much less avoided or mitigated.
(M07741481)	

CO21-4	As stated in section 4.12.1 of the EIS, once a pipeline operator has determined the HCAs on its pipeline, it must apply the elements of its integrity management plan to those segments of the pipeline within the HCAs. The criteria used to designate HCAs are defined in section 4.12.1 of the EIS. The DOT regulations specify the requirements for the integrity management plan at 49CFR Part 192.911. The pipeline integrity management rule for HCAs requires inspection of the pipeline every 7 years. The Constitution Pipeline would be added to an overall comprehensive integrity management plan that meets these regulations. The regulations do not require avoidance of an HCA.
CO21-5	We have included a recommendation in section 3.4.3 of the EIS that would require Constitution to install and maintain a security fence separating the permanent right-of-way from the school's training area. This would allow faculty and students to safely use heavy machinery in areas outside of the operational right-of-way. We understand the nature of the activities on the campus, including ground vibration from the use of heavy equipment by students nearby the pipeline, and have concluded that the pipeline would be required to meet all federal safety standards.
CO21-6	On April 7, 2014 Constitution stated that access road PAR73a would no longer be necessary on school property.

COMPANIES AND ORGANIZATIONS

CO21 – Board of Cooperative Educational Services (cont'd)

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CO21-6
cont'd

THE PROPOSED FORCIBLE TAKING OF AN ACCESS ROAD THROUGH THE SCHOOL TO BUILD THE PROPOSED PIPELINE WILL GREATLY INTERFERE WITH THE SCHOOL

22. The pipeline company provided the School with the drawing attached hereto as Exhibit A, which maps an access road, noted in the DEIS as PAR73a, directly through the School's teaching facilities. Specifically, as drawn, the proposed access road goes through the School bus loop, across the apron to the heavy equipment garage, then through the student/teacher area. This proposed use of a road through the outdoor classrooms of the School by the pipeline company's heavy equipment is completely incompatible with the health, safety and welfare of the students; sets up a direct conflict between the pipeline company's heavy equipment and the heavy equipment training facility and operations; will disrupt the academic atmosphere; and, will interfere with the pace and spacing of the School's time-sensitive curriculum. Indeed, the access road will render the School incapable of meeting fundamental School safety protocols, one of the core aspects of the curriculum.

23. Since the DEIS acknowledges, in its own words, that the impact from the proposed pipeline and the proposed access road to the pipeline upon the School is unknown, the Commission cannot simply defer to the Office of Energy Projects to somehow "work it out" prior to construction. This violates the National Environmental Policy Act. It certainly cannot be said that the Commission has taken a "hard look" at the environmental impacts of the Project upon the School at the same time it documents that it has not looked at all.

CO21-7

24. The forced taking of 5.6 acres used as a classroom by a public teaching institution; the loss of over 20% of the outdoor classroom area in a uniquely designed, special land use area; the lack of any documentation of ways to avoid the taking of School property, mitigate the impacts upon the School, minor route deviations and other alternatives analysis fully

{M07741481}

CO21-7

See the response to comment CO21-3 regarding a proposed re-route.

COMPANIES AND ORGANIZATIONS
CO21 – Board of Cooperative Educational Services (cont’d)

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CO21-7 cont'd	<p>establishes that the DEIS is inadequate. <i>See</i> <u>Natural Resources Defense Council v. Morton</u>, 458 F2d 827, 838 (DC Cir. 1972). NEPA demands that the Commission not defer a detailed analysis to the future when the impacts of the pipeline company's proposed taking of the School property are reasonably foreseeable and capable of analysis at the current time. <u>Pacific Rivers Council v. United States Forest Service</u>, 689 F3d 1012 (9th Cir. 2012). Moreover, the public disclosure objectives of NEPA require that the full impact and alternatives analysis be published in a Draft EIS, not rationalized in a post-approval discussion with one of the Commission's offices, beyond public scrutiny, just prior to construction. <i>See</i> <u>North Carolina Wildlife v. North Carolina Department of Transportation</u>, 677 F3d 596 (4th Cir. 2012). The Draft EIS simply does not explain how alternatives were screened and selected for detailed evaluation, and why others were eliminated, when the pipeline company decided to cut through and condemn the School property.</p> <p style="text-align: center;"><u>CONCLUSION</u></p>
CO21-8	<p>25. No disruption to this proceeding will result from granting the School party status.</p> <p>26. The School's interest is not adequately represented by any other party hereto.</p> <p>27. Existing parties will not be prejudiced by, nor will they sustain any additional burden by Capital Region BOCES becoming a party to this proceeding.</p> <p>WHEREFORE, Petitioner respectfully requests that the Commission grant Capital Region BOCES, owner and operator of the School, intervention as a full party in this proceeding. Capital Region BOCES does not request a hearing in this proceeding at this time; however, if a hearing is ordered Capital Region BOCES further requests that it be granted the right to have notice of and an opportunity to appear at all hearings in this proceeding, to produce evidence and witnesses, to cross-examine witnesses, and to be heard by counsel or other representatives for briefing and oral argument if oral argument is granted.</p> <p>(M07741481)</p>

CO21-8 See the response to comment CO21-2.

COMPANIES AND ORGANIZATIONS

CO21 – Board of Cooperative Educational Services (cont'd)

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CO21-8 cont'd	Dated: April 2, 2014	Respectfully submitted, McNamee, Lochner, Titus & Williams
	By: <u>/s/</u>	John J. Privitera <i>Attorneys for the Movant, Capital Region BOCES</i> 677 Broadway, Suite 500 Albany, New York 12207 Phone (518) 447-3337

{M07741481}

COMPANIES AND ORGANIZATIONS

CO21 – Board of Cooperative Educational Services (cont'd)

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CERTIFICATE OF SERVICE

CO21-8
cont'd

I hereby certify that I have this day served the foregoing document by electronic mail upon each person designated with an electronic mail address in the official service list for docket Nos. CP13-499-000 and CP13-502-000 by the Secretary to the Commission and by the U.S. Postal Service.

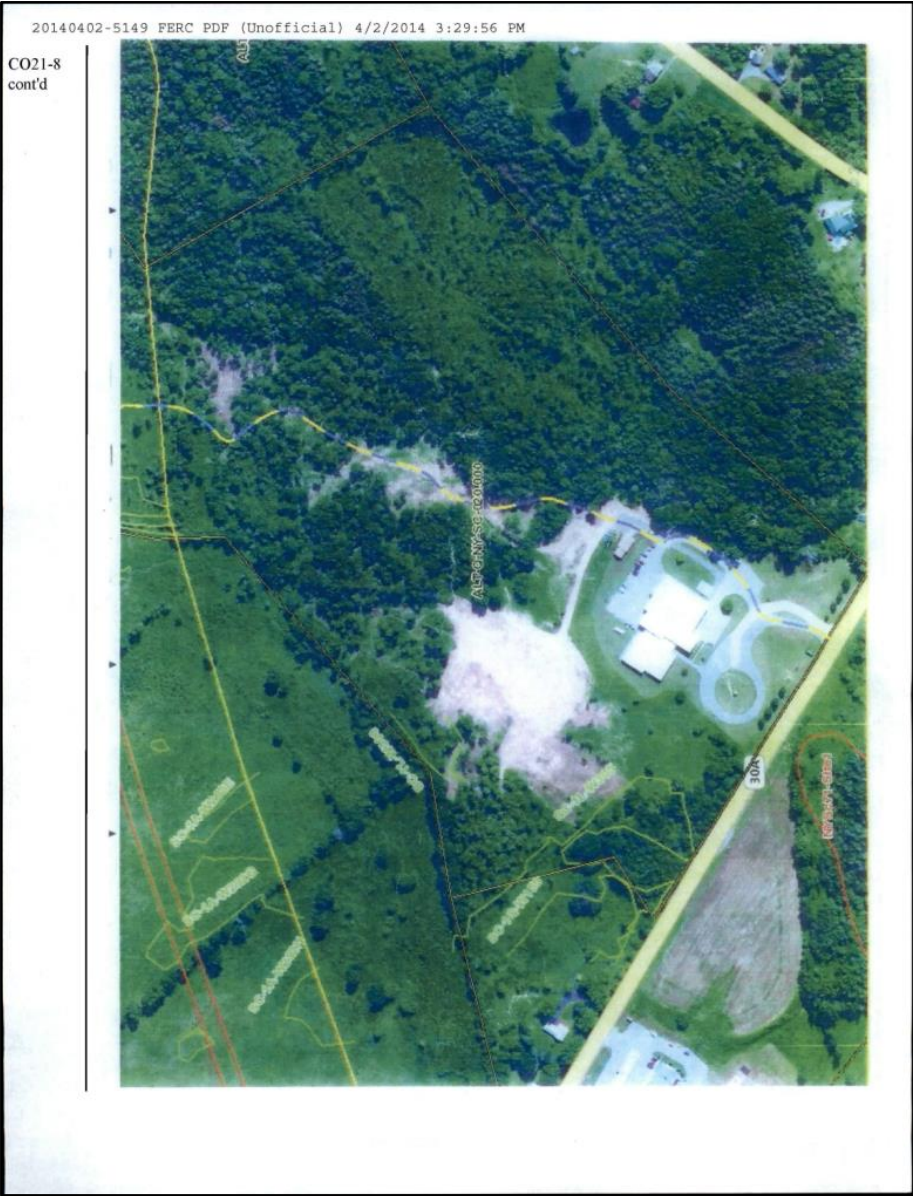
Respectfully submitted,

/s/
Kathleen L. Hill
Secretary
McNamee, Lochner, Titus & Williams, P.C.
677 Broadway - Suite 500
Albany, New York 12207
Phone: (518) 447-3234

{M07741481}

COMPANIES AND ORGANIZATIONS

CO21 – Board of Cooperative Educational Services (cont'd)



COMPANIES AND ORGANIZATIONS

CO22 – Trout Unlimited

20140403-5071 FERC PDF (Unofficial) 4/3/2014 10:27:33 AM



April 2, 2014

Kimberly D. Bose, Secretary
Federal Regulatory Energy Commission
888 First Street NE., Room 1A
Washington, D.C. 20426

RE: Comments on FERC Docket Nos. CP13-499-000 and CP13-502-000, Constitution Pipeline Project and Wright Interconnect Project Draft Environmental Impact Statement

Dear Secretary Bose:

CO22-1 Trout Unlimited (TU) respectfully requests an extension of the comment period for the Draft Environmental Impact Statement (DEIS) submitted for FERC Docket Nos. CP13-499-000 and CP13-502-000, on behalf of the Constitution Pipeline Company, LLC, and Iroquois Transmission System, LP, (collectively, "the project") due to insufficiencies in the DEIS.

CO22-2 According to the Federal Energy Regulatory Commission's (Commission) executive summary for the project, the DEIS is intended to assess the potential environmental effects of the construction and operation of the projects in accordance with the requirements of the National Environmental Policy Act (NEPA). NEPA requires that an EIS describe: environmental impacts of the proposed action; any adverse environmental impacts that cannot be avoided should the proposal be implemented; reasonable alternatives to the proposed action; the relationship between local short-term uses of man's environment and the maintenance and enhancement of long-term productivity; and any irreversible and irretrievable commitments of resources that would be involved in the proposed action should it be implemented.

However, the Commission has acknowledged that several pieces of information critical to identifying the potential impacts of the proposed Constitution project have not been provided by the project Applicants, and, thus, have not been included in the DEIS.

Such studies include:

- A formal slope stability analysis;
- The results of geotechnical feasibility studies evaluating subsurface conditions at the sites where specialized crossing methods are proposed for features including wetlands, water bodies and roads;

Trout Unlimited: America's Leading Coldwater Fisheries Conservation Organization
Eastern Water Project Office: 6281 Cayutaville Rd., Suite 100, Alpine, NY 14803
(607) 703-2056 • email: kdunlap@tu.org • <http://www.tu.org>

CO22-1 See the response to comment FA1-1 regarding an extension of the comment period.

CO22-2 See the response to comment FA1-1 regarding pending information.

COMPANIES AND ORGANIZATIONS

CO22 – Trout Unlimited (cont'd)

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CO22-2
cont'd

- Identification of water wells and springs within 150 feet of the proposed pipeline and contractor yards;
- Description of impacts and any proposed impact avoidance, minimization, and mitigation measures for each water body that would be impacted by workspaces but not crossed by the pipeline;
- Sufficient detail for proposed permanent crossings of wetlands;
- Site-specific justifications for the use of permanent fill for access roads crossings wetlands and associated water bodies;
- Site-specific blasting plans that include protocols for in-water blasting and the protection of aquatic resources and habitats; and
- Approval for water withdrawals from the NYSDEC, including limitations on when in-stream work can occur.

Without access to, and assessment of, the critical information and studies outlined above, the Commission has not adequately described the potential environmental impacts associated with this project, and, thus, the DEIS is insufficient.

TU's mission is to conserve, protect, and restore North America's coldwater fisheries and their watersheds, and we have more than 7,500 members in New York and 13,000 members in Pennsylvania who are committed to fulfilling our mission. The proposed project would cross at least 277 surface water bodies and more than 90 acres of wetlands, and without the additional information outlined above, TU cannot provide meaningful comments on the DEIS and the impacts of the project on water resources and sensitive trout habitat.

Issuance of the DEIS is premature, as critical pieces of information have yet to be provided by the Applicants, preventing the public from providing meaningful input and comments on the potential impacts of the project, thereby frustrating the public comment process.

CO22-3

Therefore, TU strongly urges the Commission to (1) require the Applicants to submit the outstanding information necessary to assess environmental impacts and identify appropriate mitigation or avoidance measures; (2) revise the DEIS to reflect the new information to be provided by the outstanding studies; and (3) provide at least 30 additional days for public comment after the revised DEIS is issued. Please do not hesitate to contact Katy Dunlap, kdunlap@tu.org or 607-703-2056, if you require additional information.

CO22-4

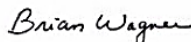
Sincerely,



Katy Dunlap
Eastern Water Project Director



Ron Urban
NY State Council Chair



Brian Wagner
PA State Council Chair

Trout Unlimited: America's Leading Coldwater Fisheries Conservation Organization
Eastern Water Project Office: 6281 Cayutaville Rd., Suite 100, Alpine, NY 14805
(607) 703-2056 • email: kdunlap@tu.org • <http://www.tu.org>

CO22-3

See the response to comments FA4-3 and FA6-6 regarding inclusion of pending information in the EIS.

CO22-4

See the response to comment FA1-1 regarding an extension of the comment period.

COMPANIES AND ORGANIZATIONS

CO23 – Center for Sustainable Rural Communities

Center for Sustainable Rural Communities
PO Box 193
Richmondville, New York 12149

April 4, 2014

Ms. Kimberly D. Bose
Secretary
Federal Energy Regulatory Commission
888 First Street, NE
Washington, D.C. 20426

Us Army Corps of Engineers
New York District CENAN-OP-R
Upstate Regulatory Field Office
1 Buffington Street, Bldg. 10, 3rd Floor
Watervliet, New York 12189-4000

RE: Docket Nos. CP13-499 and CP13-502, NAN-2012-00449-UBR

CO23-1

Comment to the FERC regarding the failure of the DEIS to substantively address the public health risks associated with fugitive emissions.

The Center for Sustainable Rural Communities (CSRC) is a 501 (C)3 non-profit New York Corporation that advocates for vibrant, livable and sustainable rural communities in Upstate, New York. CSRC encourages environmentally-compatible economic development, access to arts and technology and progressive community and land-use planning while working to preserve the rural character and ecological and cultural diversity of the region.

The CSRC, an Intervener on the matter of the proposed Constitution Pipeline (Docket No. 13-499), is responding to concerns expressed by both residents and public officials of Schoharie County, New York by submitting the comments contained in this document. The CSRC acknowledges the work of community volunteer Glenn Sanders in preparing this comment.

The documentation list below in **Appendix I** was reviewed by the NY Schoharie County Public Health Department, Standing Committee on Public Health, and by the full Board of Supervisors. The scientifically credible basis for a foreseeable risk to public health from fugitive emissions was the impetus for Schoharie County Resolution 36 (included below as **Appendix II**), enacted on March, 15, 2013, and filed with the FERC as a Public Comment during the pre-filing phase of the Constitution proposal.

The essence of Resolution 36 is a request for comprehensive health impact analyses to determine if chronic exposure to fugitive emissions from existing pipelines similar to the proposed Constitution results in observable negative impacts. In the absence of such assessments, Resolution 36 requested that the FERC EIS conclude that this absence is a "significant omission" in the records available for its review.

CO23-1

The commentor's statements regarding Chairman Wellinghoff's letter is noted. We note that Chairman Wellinghoff's letter to Congressman Gibson stated "the EIS will address all substantive issues raised during the public scoping process, including the public health concerns raised by Schoharie County, and will include mitigation measures necessary to reduce impacts on the affected environment." Section 4.11.1 of the EIS has been revised to include an expanded discussion of fugitive emissions. The potential health effects regarding methane are discussed in section 4.12 of the EIS.

COMPANIES AND ORGANIZATIONS

CO23 – Center for Sustainable Rural Communities (cont'd)

CO23-1
cont'd

U.S. Congressman Chris Gibson reviewed the Documentation Page and Resolution 36. He made a request to FERC that the issue of fugitive emissions be given a hard look. The FERC Chairman, Jon Wellinghoff, gave his assurances that the concerns expressed in Resolution 36 would be given serious consideration. But to the contrary, the issue of comprehensive health impacts analyses, in general or specifically related to fugitive emissions, appears nowhere in the draft EIS. The only reference to fugitive emissions appears in the discussions of air quality. These pipeline operation emissions (distinct from compressor station emissions) are dismissed as "negligible" (last lines in Section 4, page 168) and "not expected to have significant impacts" (first lines in Section 4, page 169). No documentation is provided for this evaluation. No mention of fugitive emissions appears in the draft EIS sections on soil and water impacts. No reference is made to Resolution 36. No consideration is given to any of the relevant studies and reports on the Documentation Page attached to this Comment.

Despite the interests of the Schoharie County Board of Supervisors and U.S. Congressman Gibson, and despite the written assurances of Chairman Wellinghoff, there is no indication of a "hard look" at fugitive emissions from pipeline operation anywhere in the draft EIS. An analysis of NEPA requirements, and Court decisions (excerpts from Bisbee, 2003, and its Footnote 74, printed at the end of this Comment) indicate that the FERC's draft EIS shall consider, and conduct if feasible, the health impacts assessment called for above.

In light of all the facts and references provided in this Comment, the FERC's evaluation of fugitive emissions from pipeline operation is incomplete and inadequate and an issuance and any approval of the proposed Constitution Pipeline without comprehensive and scientifically credible evaluation of fugitive emissions would be arbitrary and capricious.

Appendix I - Documentation of the Need for Comprehensive Health Impact Assessments of Natural Gas Operations (considered for Resolution 36 on Natural Gas Health Impacts)

1. Radon, benzene, toluene, methyl mercury, and formaldehyde are among the toxic "impurities" in natural gas. A list of inherent toxins is presented in the following link to the U.S. Energy Information Administration:

http://www.eia.gov/pub/oil_gas/natural_gas/analysis_publications/natural_gas_1998_issues_trends/pdf/chapter2.pdf

2. These inherent toxins, along with methane, and other toxins which may be introduced during various steps in gas operations, are released in significant quantities into the atmosphere, the soil, and groundwater as a result of leaks ("fugitive escapes"), venting, and combustion. These releases are documented in the following government, industry, news service, and academic source material:

<http://www.epa.gov/gasstar/documents/redesignblowdownsystems.pdf>
[routine massive venting from compressor stations]

COMPANIES AND ORGANIZATIONS

CO23 – Center for Sustainable Rural Communities (cont'd)

CO23-1
cont'd

<http://iopscience.iop.org/1748-9326/8/1/014017>

[toxic releases from gas operations measured in tons per year]

http://www.edf.org/sites/default/files/9235_Barnett_Shale_Report.pdf

<http://www.eeb.cornell.edu/howarth/Howarth%20et%20al.%20--%20National%20Climate%20Assessment.pdf>

[best estimate is that just under 1% of pipeline contents escape as leaks]

<http://www.migmasys.com/GasTutamen.html>

[leaks are extremely difficult to detect]

<http://www.ingaa.org/cms/33/1060/6435/5485.aspx>

[estimates of releases have high degree of uncertainty]

<http://www.nytimes.com/2009/10/15/business/energy-environment/15degrees.html>

<http://www.epa.gov/airquality/oilandgas/pdfs/20110728factsheet.pdf>

[pollutants also emitted from processes used to move gas through pipelines]

3. Chronic, low-level exposure to these released toxins may have significant adverse impacts on public health. This possibility is strongly suggested by the following government, academic, environmental, news service, and medical source material:

<http://www.epa.gov/radon/healthrisks.html>

[chronic, low-level radon exposure has significant adverse health impacts]

<http://des.nh.gov/organization/commissioner/pip/factsheets/ard/documents/ard-ehp-3.pdf>

<http://iopscience.iop.org/1748-9326/8/1/014017>

[converts health impacts into million-dollar costs per county]

<http://www.endocrinedisruption.com/files/HERA12-137Table4References.pdf>

[37 pages of studies showing health impacts of chronic, low-level exposure to gas toxins]

http://www.pressaction.com/news/weblog/full_article/wilmasubra04012012/

<http://newyork.sierraclub.org/documents/FERCNGP-SC-FWWCommentsCP11-56.pdf>

[gas from Marcellus fields has much higher radon content]

http://www.catskillcitizens.org/learn_one.cfm?t=13&c=47

<http://www.thevillager.com/?p=7817>

<http://www.ccag.org.au/images/stories/pdfs/literature%20review%20witter%20et%20al%202008.pdf>

[epidemiological evidence of health impacts from chronic, low-level gas toxin exposure]

<http://www.gascape.org/California%20Gas%20Warning.html>

http://rwma.com/newsletter/fracking_special_edition_2012.htm

http://dbp.idebate.org/en/index.php/Argument:Natural_gas_can_be_harmful_and_even_poi

[sonous_to_ingest](http://dbp.idebate.org/en/index.php/Argument:Natural_gas_can_be_harmful_and_even_poi)

[references to physicians linking natural gas exposure to human illnesses]

<http://www.ncbi.nlm.nih.gov/pubmed/11762803>

4. There are no references to comprehensive health impact assessments for chronic, low-level exposure to natural gas toxins in any of the above sources.

COMPANIES AND ORGANIZATIONS

CO23 – Center for Sustainable Rural Communities (cont'd)

CO23-1
cont'd

Appendix II – Schoharie County Board of Supervisors Resolution 36 of March 15, 2013

March 15, 2013
Schoharie County Resolution 36
Resolution on Comprehensive Health Impact Assessments
for Natural Gas Projects

WHEREAS, Schoharie County currently hosts two interstate natural gas transmission pipelines and one propane gas transmission pipeline, and

WHEREAS, the NY Department of Environmental Conservation (DEC) is on record as advising the Federal Energy Regulatory Commission (FERC) that a proposed interstate natural gas transmission pipeline (Constitution), which has a preferred route through Schoharie County, has a reasonably foreseeable impact of promoting gas-related heavy industrial developments alongside and nearby its route, and

WHEREAS, the Schoharie County Standing Committee on Public Health and the County Department of Health are in receipt of concerns expressed by health professionals and regulatory officials regarding a reasonably foreseeable risk of significant adverse public health impacts created by the above-noted pipelines and industrial developments, and

WHEREAS, there are no comprehensive health impact assessments pertaining to the above-noted health concerns, conducted in accord with accepted research standards of scholarly institutions, that have been made available to or can be identified by the Schoharie County Department of Health, and

WHEREAS, the Federal Energy Regulatory Commission (FERC) has requested input from all interested parties concerning environmental impacts of the proposed Constitution gas pipeline, so that these impacts may be properly studied and evaluated, so therefore, be it

RESOLVED, that the Schoharie County Board of Supervisors requests that comprehensive health impact assessments be among the issues considered by any and all regulatory agencies reviewing projects proposed for siting within the County which include natural gas exploration, production, waste products, transmission, storage, or delivery, and be it further

COMPANIES AND ORGANIZATIONS

CO23 – Center for Sustainable Rural Communities (cont’d)

CO23-1
cont'd

RESOLVED, to request that certifications or permits issued by said regulatory agencies include requirements for reasonable mitigation of significant adverse health impacts reported in said comprehensive assessments, and be it further

RESOLVED, to request that the inability to include comprehensive health impact assessments in the course of reviewing natural gas proposals be considered by regulatory agencies to be a significant omission in the data available for review, and be it further

RESOLVED, to submit this Resolution, together with the attached Documentation, in a timely manner and in the form of a Public Comment to FERC as regards the proposed Constitution gas transmission pipeline.

COMPANIES AND ORGANIZATIONS

CO24 – Cornell University for Kernan Land Trust



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March 23, 2014

SENT VIA ELECTRONIC FILING

Reference: DEIS Section 4.5.5 Noxious Weeds and Other Invasive Plant Species

OEP/DG2E/Gas 4
Constitution Pipeline Company, LLC
Constitution Pipeline Project
Iroquois Gas Transmission System, L.P.
Wright Interconnect Project
Docket Nos. CP13-499-000
CP13-502-000

Ms. Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
Washington DC 20426
Re: Docket No. CP13-499-000
Constitution Pipeline

Dear Ms. Bose:

CO24-1

I have reviewed Section 4.5.4 Noxious Weeds and Other Invasive Plant Species of the Draft Environmental Impact Study for the Constitution Pipeline and Constitution's Invasive Species Management Plans for New York State. In my professional judgment, these documents neither describe nor propose any methodologies or procedures that would effectively prevent and control the spread of aggressive invasive species into the wetlands along the proposed pipeline route or maintain their infestations to below an acceptable level that would not unavoidably and irreversibly negatively affect the ecology and native plant species in these wetlands.

Specifically, I have examined the ecological and botanical data from field surveys of the Clapper Lake – Mud Pond wetland complex on the property of the Kernan Land Trust between MP 90.0 and 90.8 of the proposed route for the pipeline and put this into perspective of my knowledge of invasive species in the entire region. It is clear that if the pipeline crosses this currently pristine wetland complex, its infestation with non-native

CO24-1

The commentator's statements regarding invasive species are noted. See the responses to comments FA4-9 and FA4-27. The FERC staff also recommended in section 4.5 of the EIS that Constitution extend monitoring for invasive species.

COMPANIES AND ORGANIZATIONS

CO24 – Cornell University for Kernan Land Trust (cont'd)

S-303

CO24-1
cont'd

plant species will be unavoidable and irreversible despite your proposed mitigation measures. Such infestation will inevitably, permanently and drastically degrade the current unique ecological and botanical characteristics of the Clapper Lake – Mud Pond wetland complex. Your proposed mitigation measures, while laudable and extensive, ignore the fact that, once established, no physical or chemical methods exist to eradicate or contain some of the problematic invasive species that were identified in the vicinity of the pipeline. I am particularly concerned with Japanese knotweeds (*Fallopia* spp.) and common reed (*Phragmites*), both species widely distributed in the region, and along highway ROW's that your vehicles will use. Both species respond to disturbances and have shown the ability to disperse aggressively. Even containing these species (no early detection will allow you to discover the first colonizing individuals) will require near annual and repeated use of herbicides in areas currently considered pristine environments. The frequent use of herbicides to combat plant invaders will further degrade and have unintended consequences for native biota in the affected wetlands. In fact, herbicide use or other treatments designed to negatively affect plant invaders often further stress native species and further their declines.

CO24-2

I am well-qualified to assess the potential consequences of the proposed pipeline construction for the spread of invasive species, given my nearly 30 years' experience in working with impacts and control of invasive plant species. I have worked with impact and control of invasive species since the early 1980's. Initially in Europe, and since 1992 at Cornell University, where I direct the Ecology and Management of Invasive Plant Species Program. I have had extensive practical and research experience with many forest invasive species and in particular with wetland invaders such as water chestnut (*Trapa natans*), purple loosestrife (*Lythrum salicaria*), Japanese knotweed and its various hybrids (*Fallopia japonica*, *F. bohemica* and *F. sachalinense*), native and introduced *Phragmites* (*Phragmites australis*), Eurasian watermilfoil (*Myriophyllum spicatum*), and many others. I have researched and implemented the nationwide bio-control program targeting purple loosestrife and I coordinate or participate in bio-control development of Japanese knotweed, water chestnut, introduced *Phragmites* and garlic mustard (*Alliaria petiolata*). In addition to the development of bio-control programs, I have guided students and staff in large federally funded research programs to assess impacts of introduced plant species on native fauna and flora. Furthermore, I am the supervisor of the director of the New York Invasive Species Research Institute established at Cornell University 5 years ago.

I would like to highlight my research and work experience with *Phragmites*, one of the most likely invaders of the area given its propensity to spread. We have researched control program for this species across the US and discovered that despite annual expenditures of US\$ 4 million, management agencies are unable to stop the spread or reduce negative ecological impacts. Your mitigation plan clearly fails to acknowledge the impossibilities of impact management and offers unsupported claims for the restoration of the wetlands your pipeline will impact. I have worked with numerous consultants (including in New York State) hired by pipeline construction companies, who have struggled to restore pipeline right-of-ways that have become infested with exotic plant species, particularly by purple loosestrife and *Phragmites*. These species are prone

CO24-2

The commentor's credentials are noted.

COMPANIES AND ORGANIZATIONS

CO24 – Cornell University for Kernan Land Trust (cont'd)

S-304

CO24-2
cont'd | to spread on construction equipment or along the linear dispersal corridors created by construction activities. Clearly, there are better alternatives along already disturbed ROW's.

CO24-3 | In relation specifically to the Clapper Lake – Mud Pond wetland on the property of the Kernan Land Trust, most significant to me is the assessment made by two professional environmental firms that they currently have no **invasive plant species**. Absence of invasive species in the wetlands of the region of New York which the proposed pipeline will cross is a rarity. The establishment and spread of invasive species has been studied around the globe, and there is no doubt that disturbance events, including construction activities, construction equipment and opening up of intact plant communities, are major contributors to the spread of invasive species. The areas between Mud and Clapper Lake are prime examples of habitats and communities that have not suffered from such disturbances and have thus far remained in a pristine state. In my opinion, ensuring the protection of habitats that are not invaded by introduced species should receive the highest priority in the policies and decisions of agencies of the federal government. Nationwide assessments by the National Research Council have shown that restoration of degraded wetlands is nearly impossible and likely to fail. The Clapper Lake – Mud Pond wetland is such a unique place that I consider it the social responsibilities of those proposing a pipeline construction to avoid the destruction of intact plant communities at all costs if alternatives are available.

In summary, any disturbance in a wetland that is currently free of invasive, exotic species will inevitably open up the floodgates for colonization by non-native species and, while there are plenty ways to kill individual plants, no methods exist that are able to prevent or control the establishment and rapid spread of the most serious invasive, exotic plant species.

CO24-4 | Thus the alternative pipeline routes that the Kernan Land Trust has proposed make enormous sense to me. Co-locating this new pipeline to the existing infrastructure should have the highest priority before destroying unique and pristine areas. In my view there is absolutely no justification for the proposed route across the Clapper Lake – Mud Lake wetland, given the possibility of co-locating the pipeline with existing pipeline and highway infrastructure. In fact, I cannot contemplate a clearer cut example where priority should be given to routing new construction along infrastructure corridors that have already been disturbed and thereby opened up to the spread of invasive plant species.

Sincerely,



Dr. Bernd Blosser
Associate Professor and Director
Ecology and Management of
Invasive Plants Program

CO24-3

See the responses to comments FA4-9 and FA6-10 regarding invasive plant species. We have updated section 3.4.3 of the EIS with new information and with our conclusion regarding potential impacts upon the Trust property.

CO24-4

See the response to comment CO4-2.

COMPANIES AND ORGANIZATIONS

CO25 – Advocates for Springfield

S-305

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Harry Levine, Springfield Center, NY.
ADVOCATES FOR SPRINGFIELD
P. O. Box 25
Springfield Center, New York 13468

April 6, 2014

Kimberly D. Bose, Secretary
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Jodi M. McDonald, Chief
Regulatory Branch, US Army Corps of Engineers
New York District CENAN-OP-R
Upstate Regulatory Field Office
Buffington Street, Bldg. 10, 3rd Floor
Watervliet, New York, 12189

RE: Constitution Pipeline: FERC Docket Nos. CP 13-499-000 and CP 13-502-000

Dear Secretary Bose and Ms. McDonald:

CO25-1 Please accept the following comments from Advocates for Springfield on the Draft Environmental Impact Statement (DEIS) for the proposed Constitution Pipeline, particularly as it affects our area of northern Otsego County, New York.

Advocates for Springfield is a local group of about 300 residents and property owners in and around the town of Springfield at the northern edge of Otsego Lake. We are concerned about protecting the rural character of our community including encouraging development that is consistent with that character.

The DEIS is completely devoid of any reference to impacts on our area. Approximately 20% of our land has been leased by the gas industry in anticipation of being allowed to frack for natural gas under a generic environmental impact statement that is currently under review. Our town adopted a ban on such drilling in 2011 because we believed (and continue to believe) that this activity will be harmful to our natural resources, our rural character, our water quality, our air quality, and our public health. The industry has challenged the ban enacted in an adjoining community (Middlefield) and the matter is currently at the appellate level of judicial review. We are an agricultural community with a strong economic base in second homes and tourism. We believe that gas drilling and its related activities will harm our quality of life and our economic well being.

CO25-2 The proposed Constitution Pipeline, although represented in the DEIS as not affecting expansion of the gas drilling industry along its route, will lead to a push for just such expansion. We reference the summary provided by Otsego 2000 in its comments (see letter dated April 4, 2014, Section II (A), The DEIS Improperly Dismisses Foreseeable Shale Gas Development in New York State). We respectfully request that the DEIS be revised to explore the very real potential for local tap in access to the proposed pipeline. Such revision should include areas such as ours that are seemingly distant from the proposed path of the Pipeline.

CO25-1 See the response to comments LA1-4 and CO16-9. The status of high volume hydraulic fracturing in both Pennsylvania and New York is discussed in section 4.13. The FERC does not regulate gas well drilling, hydraulic fracturing, or gathering lines. The use of high volume hydraulic fracturing in New York is currently prohibited and would be dependent upon actions taken by state and local governments and their regulatory agencies.

CO25-2 See the response to comment LA1-4.

COMPANIES AND ORGANIZATIONS

CO25 – Advocates for Springfield (cont’d)

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CO25-3 | The revision should include forecasted primary and secondary impacts on the development of fracking activities in the region. We share the concern of others about the hazards of the pipeline itself, but our narrow interest has to do more with the secondary impacts due to the encouragement of drilling in our area and the potential for constructing a web of feeder lines to the Constitution Pipeline.

Thank you for considering our comments.

Harry Levine
President

CO25-3 See the responses to comments LA1-4, CO25-1, and CO25-2. As discussed in section 4.13.1 of the EIS, the general development of the Marcellus Shale in proximity to the projects was considered within the context of cumulative impacts.

COMPANIES AND ORGANIZATIONS

CO26 – Otsego 2000

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Attachments to this comment have been deleted as they do not pertain to the Constitution Pipeline DEIS. The attachments are available on the FERC eLibrary: http://elibrary.FERC.gov/dmws/file_list.asp?accession_num=20140404-5164



This submittal has also been submitted 3 times.

April 4, 2014

Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
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Jodi M. McDonald, Chief
Regulatory Branch, US Army Corps of Engineers
New York District CENAN-OP-R
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RE: Constitution Pipeline: FERC Docket Nos. CP 13-499-000 and CP 13-502-000; USACE Docket No. NAN-2012-00449-UBR

Dear Secretary Bose and Ms. McDonald:

CO26-1 Please accept the following comments from Otsego 2000, Inc. on the Draft Environmental Impact Statement (DEIS) for the proposed Constitution Pipeline, particularly as it affects the counties of Otsego, Delaware, and Schoharie in New York State. Otsego 2000, Inc. is an intervener in these proceedings and on October 10, 2012, filed comments on the scope of the required environmental review (PF12-9) in connection with the proposed Constitution Pipeline. We regret that the DEIS failed to consider or adequately respond to our scoping comments. We urge FERC to withdraw the DEIS and take no further action on the application until all of the matters set forth in our scoping comments, as discussed more fully here, are addressed.

CO26-2 Otsego 2000, located in the village of Cooperstown, New York, is a nonprofit organization formed over thirty years ago to protect and enhance the rural, historic, agricultural, and environmental resources of the region surrounding Otsego Lake, which is also the headwaters of the Susquehanna River. In addition, we are a founding member of Citizens Against Unsafe Drilling, a coalition comprised of more than thirty grassroots organizations throughout Otsego County and the surrounding area. These organizations represent thousands of residents opposed to shale gas extraction and its related infrastructure, including the proposed pipeline projects.

Our region is blessed to have retained a scenic rural landscape reflective of its rich agricultural history and culture. Significant private and public investments have contributed to preserving this environment, and to building an economy consistent with its historical roots—one that supports agriculture, academic institutions, museums, tourism, and a strong second-home market. Among the many cultural and economic assets of our region are the National Baseball

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CO26-1 The commentor's statements regarding the adequacy of the draft EIS are noted.

CO26-2 The commentor's statements regarding the landscape and amenities of the Otsego County area are noted.

COMPANIES AND ORGANIZATIONS

CO26 – Otsego 2000 (cont'd)

S-308

20140404-5164 FERC PDF (Unofficial) 4/4/2014 1:43:10 PM	
This submittal has also been submitted 3 times.	
CO26-2 cont'd	Hall of Fame, Glimmerglass Festival, Fenimore Art Museum, the Farmers' Museum, Hartwick College, SUNY Oneonta, Brewery Ommegang, and Bassett Healthcare among many others. The region also has well over 36,000 acres listed on the State and National Registers of Historic Places, including the Glimmerglass Historic District, the first cultural landscape designated as a National Historic District.
CO26-3	<p>The Upper Susquehanna River Watershed, which the Constitution Pipeline would traverse, covers Otsego County, northern Delaware County and part of Schoharie County, and provides drinking water to more than 600,000 visitors and residents annually. Federally recognized in 1972 as an "American Heritage River," the Susquehanna River supplies nearly half of the fresh water that flows into Chesapeake Bay and serves millions of consumers along its route. It is noteworthy that in 2011 the national conservation organization, American Rivers, named it "America's Most Endangered River" due to the looming threat of shale gas development.</p> <p>The Upper Susquehanna River Watershed is noted for its landscape of forests, hills, fields, streams, and wetlands, providing critical habitats that sustain a remarkable diversity of flora and fauna, including species designated as endangered, threatened, and of concern. Moreover, the watershed is ecologically connected to the northern Catskill region, collectively forming a contiguous landscape of diverse habitat, which would be divided and substantially harmed by the proposed pipeline project. Protection of the Upper Susquehanna River Watershed and northern Catskill region is crucial to protection of the existing economic base. The economy of this important region is directly connected to its undisturbed lands, clean air and water, agriculture, organic farms, breweries, historic preservation and heritage tourism, outdoor recreation, including hiking, hunting, and fishing, and a second-home market. The proposed projects threaten all of these significant regional assets.</p>
CO26-4	<p>I. NEW, CONTRADICTIONARY, AND INCOMPLETE DOCUMENTATION REQUIRES WITHDRAWAL OF THE DEIS.</p> <p>A. New Developments Have Changed the Scope of the Project.</p> <p>The Applicants recently submitted new documents at the end of the public comment period seeking to expand the scope of the project to include at least 11 communications towers greater than 100 feet in height. This new information was submitted on March 27, 2014, just 12 days before the public comment period is set to close. Interveners and the general public must be given an extension of time to respond with respect to this newly disclosed information.</p> <p>Further, the Applicants have only recently disclosed that they have entered into binding agreements to supply natural gas from the project to certain municipalities along the proposed route. In a motion to intervene dated June 12, 2013, Leatherstocking Gas Company LLC indicated that it "may" enter into a Memorandum of Understanding with Constitution for gas delivery at several points along the proposed route. See also DEIS Introduction, p.1-2: "...Constitution has identified that the proposed pipeline could provide natural gas service to nearby municipalities." However, in a response to scoping questions dated September 7, 2012, the Applicant expressly denied that such matters are being considered, stating:</p>

CO26-3

The proposed pipeline would cross through the Susquehanna River watershed and across tributaries of the Susquehanna River as noted within the EIS in section 4.3, among others. It would not cross the Susquehanna River itself. The broader ecology and economy of the region, as well as more specific information, is discussed throughout the EIS.

CO26-4

See the response to comment SA2-1 regarding the newly proposed communication towers. See the response to comment FA4-46 regarding new information about the potential for local distribution of natural gas via Leatherstocking Gas Company. See the response to comment FA1-1 regarding the request for an extended comment period.

COMPANIES AND ORGANIZATIONS

CO26 – Otsego 2000 (cont'd)

S-309

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This submittal has also been submitted 3 times.	
CO26-4 cont'd	<p>...the Constitution pipeline is designed to meet its customers' contractual commitments and is not designed to provide natural gas to any specific end user or market other than those currently identified... [B]ased on the executed long-term, binding agreements with two shippers, consistent with Commission policy, Constitution will comply with the need outlined in our binding precedent agreements to the shippers and considers any comment outside of these agreements as speculative. (Emphasis added.)</p> <p>In the summary of existing or potential projects evaluated for cumulative impacts, FERC reported that the status of the Leatherstocking project was "unknown" (DEIS, Table 4.13-1, p.4-209.). As a result, the EIS did not address the cumulative impacts of such development. Now, on March 18, 2014, near the close of the public comment period, the Applicants have confirmed that four delivery taps will in fact be installed along the proposed route to provide local gas service. However, the direct, indirect and cumulative impacts of these delivery taps have not been addressed in the DEIS.</p>
CO26-5	<p>It must be emphasized that the NYSDEC specifically requested that these matters be addressed in the EIS, stating:</p> <p>...the draft EIS must evaluate whether the pipeline would be reasonably available for supply and distribution for communities along the pipeline route...The draft EIS discussion should include the applicable procedures and requirements for the potential aforementioned activities...the draft EIS should describe and evaluate...if the pipeline supply is available to additional customers along the route, describe what additional facilities or upgrades would be needed...and their associated environmental impacts. (NYSDEC, Comments on Scope of the EIS, dated November 7, 2012; emphasis added.)</p> <p>FERC's refusal to address these impacts in the DEIS is an error that must be corrected.</p>
CO26-6	<p>We understand that the United States Environmental Protection Agency (EPA), United States Department of the Interior (DOI), and New York State Department of Environmental Conservation (NYSDEC) have each, respectively, asked for an extension of time to comment on the DEIS. Otsego 2000 concurs that additional time is warranted and strongly urges FERC to immediately grant an extension of at least 60 days to allow interveners and the public to address the recent changes to the project scope. Our ability to comment on the DEIS is gravely compromised by the inclusion of late changes and the failure of FERC to consider issues in the DEIS previously questioned by the parties.</p>
CO26-7	<p>B. Pipeline Capacity is Misstated and Contradictory.</p> <p>The DEIS states unequivocally that: "Constitution and Iroquois have not identified or proposed any plans for future expansion of their system." (DEIS, p. 2-32.) However, later in the document, FERC contradicts this statement, asserting:</p> <p>...the Constitution pipeline's maximum capacity would be 850,000 Dth/d, which is 200,000 Dth/d (31 percent) greater than the currently proposed level [650,000 Dth/d]. This relatively modest allowance for increased capacity would likely preclude the use of</p>

CO26-5 See the response to comment FA4-46 regarding the Leatherstocking proposal.

CO26-6 See the response to comment FA1-1.

CO26-7 The proposed transport volume of the Constitution pipeline is 650,000 Dth/d of natural gas. Based on Constitution's response to one of our environmental information requests, it reported that the maximum capacity of the pipeline system would be 850,000 Dth/d. That estimated maximum delivery volume resulted from our desire to fully understand whether the Constitution pipeline could serve as a major conduit for newly emerging supplies of natural gas, should they occur. There are no plans to increase the delivery volume beyond 650,000 Dth/d, and if such plans were ever proposed in the future then additional FERC review and other agency permitting would be required as applicable. The draft EIS is accurate and current; there are no plans by Constitution or Iroquois to expand pipeline delivery capacity. We concluded that a theoretical maximum increase of transport capacity of natural gas by 31 percent to be relatively modest. Any other "parallel pipeline" would be subject to the FERC review. Constitution is only proposing one pipeline.

COMPANIES AND ORGANIZATIONS

CO26 – Otsego 2000 (cont'd)

S-310

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This submittal has also been submitted 3 times.	
CO26-7 cont'd	<p>the Constitution line as a major conduit for newly emerging gas supplies, should they occur. (DEIS, p. 4-203; emphasis added.)</p> <p>This inconsistency must be corrected and explained. First, a "31 percent" increase in capacity cannot conceivably be described as "modest." Furthermore, the assertion that the stated capacity "precludes" the Constitution Pipeline from becoming a major conduit for newly emerging gas supplies completely ignores the potential for future parallel pipelines that could be installed within the proposed easement. An increase of capacity by 31% would most likely entail the need for an additional compressor station, which must be considered as direct, indirect, and cumulative impacts of the project.</p>
CO26-8	<p>Equally troubling is an assertion contained in the draft New York Energy Plan, released on January 7, 2014, reporting that in the future, capacity of the Constitution Pipeline will be significantly increased above the capacity projected in the DEIS. Specifically, the Energy Plan states that the new pipeline will initially be designed to transport at least 500,000 dekatherms (Dth) per day, but will be expandable to meet growing demand for takeaway capacity in northeast Pennsylvania. (New York Energy Plan [Draft 2014] Volume 2, Sources, Table 5A, Planned Northeast Pipeline Projects; emphasis added.) Thus, the New York State Energy Plan clearly contemplates that significant "expansion" will occur. Such an increase in capacity would clearly lead to aggravated environmental impacts, which the EIS has entirely ignored. It is also foreseeable that such additional capacity would facilitate an expanded footprint of gas extraction impacting Pennsylvania and New York State, which the DEIS has improperly and summarily dismissed from consideration. (See discussion at Part II. A, below.)</p> <p>The public has a right to know with certainty what plans for expansion exist, how expanded capacity will be added to the pipeline, and what the environmental impacts of the expansion will be. This is particularly true where the right of eminent domain is granted based on a defined capacity. The full potential for pipeline expansion and related direct, indirect, and cumulative effects must be comprehensively addressed in a revised DEIS.</p> <p>C. Referenced Analyses Are Grossly Incomplete and Premature.</p>
CO26-9	<p>Virtually no aspect of the draft EIS is complete. The deficiencies are pervasive and substantial. Taken together they deprive the public of a meaningful opportunity to comment on the proposed plans and fail to impose enforceable mitigation measures prior to permitting. Significant omissions that FERC admits are not addressed in the DEIS include, but are not limited to, the following:</p> <ul style="list-style-type: none"> ▪ Geotechnical feasibility studies for trenchless crossings at 9 out of 12 locations have not been completed (DEIS, p. 5-1); ▪ Water wells and springs within 150 feet of the project are not identified (DEIS, p. 5-3); ▪ Field studies of wetlands and water body impacts are not completed (DEIS, p. 5-3); ▪ Sufficient detail for proposed permanent access road crossings of water bodies and wetlands are not provided (DEIS, p. 5-4);

CO26-8

Constitution's June 2013 application as well as its more recent filings identified a proposed transportation volume of 650,000 Dth/d, not 500,000 Dth/d and expandable as described in the comment and the 2014 New York Energy Plan. The New York Energy Plan was developed by the New York State Energy Planning Board to meet the needs of the state. The FERC was not involved in the development of this plan and neither endorses nor opposes the plan. See also the responses to comments FA4-2 and CO26-7.

CO26-9

See the responses to comments FA1-1 and FA4-3.

COMPANIES AND ORGANIZATIONS

CO26 – Otsego 2000 (cont'd)

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CO26-9
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- Impacts on water bodies that will not be crossed are not provided (DEIS, p. 5-4);
- Impact assessments and/or descriptions of 54 permanent access roads and access roads leading to metering stations are not provided (DEIS, p. 5-5);
- While admitting that the greatest impacts will be on vegetation and on forested lands with 36 miles of forested lands to be crossed, no Upland Forest Mitigation Plan has been prepared (DEIS, p. 5-6);
- The invasive species survey is not complete and wash stations have not been identified (DEIS, p. 5-6);
- Mitigation plans for migratory bird habitat have not been prepared (DEIS, p. 5-7);
- No in-stream blasting plan has been submitted for public review (DEIS, p. 5-7);
- Approvals have not been secured for water withdrawals, and plans to cross streams during spawning windows have not been approved (DEIS, p. 5-8);
- Necessary surveys for "special status species" including bald eagles, sensitive bat species, dwarf wedge mussels, northern monkshood, and other listed species of concern have not been completed (DEIS, p. 5-9);
- A bald eagle mitigation plan for blasting and other construction activity in proximity to bald eagle nests has not been developed (DEIS, p. 5-9);
- Anticipated specific residential development impacts and specialty farm impacts are not finalized (DEIS, p. 5-9);
- Plans for mitigation of impacts on property insurance are missing (DEIS, p. 5-10);
- Required surveys of historic and cultural resources are not completed (DEIS, p. 5-12);
- Mitigation measures for exceeding air emission standards are not completed (DEIS, p. 5-13);
- Mitigation measures for exceeding noise standards have not been prepared (DEIS, p. 5-13);
- Plans for inspection of the pipeline for hazards and repairs are not set forth (DEIS, p. 5-14); and
- Plans for emergency training, equipment procurement and emergency response are not provided (DEIS, p. 5-14).

The above omissions go to the very heart of the question of whether this project can or should be constructed. By providing a wholly incomplete DEIS for public comment, FERC has put the public and the communities, which this project would impact, in an untenable position. Clearly the permitting of this project should not be considered until all of the documents and information

COMPANIES AND ORGANIZATIONS

CO26 – Otsego 2000 (cont'd)

S-312

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This submittal has also been submitted 3 times.	
CO26-9 cont'd	identified on the face of the DEIS are completed and made available to the public for comment. The DEIS is premature and must be withdrawn until this occurs.
CO26-10	<p>II. THE DEIS FAILS TO ADDRESS DIRECT, INDIRECT AND CUMULATIVE IMPACTS AS REQUIRED BY LAW.</p> <p>A. The DEIS Improperly Dismisses Foreseeable Shale Gas Development in New York State.</p> <p>There can be no serious dispute that the negative impacts of the proposed Constitution Pipeline fall most heavily on New York State. Nearly 100 miles of the 120-mile project are located in New York. Yet the DEIS fails to consider indirect or cumulative impacts which will result from shale gas development in New York. FERC has categorically ignored detailed plans proposed by NYSDEC in the revised draft "Supplemental Generic Environmental Impact Statement on the Oil, Gas and Solution Mining Regulatory Program" (SGEIS). These plans would launch a broad program for high volume hydraulic fracturing in the Marcellus and Utica Shale formations of New York State. Consideration of the plans set forth in the SGEIS must not be ignored. Nor may FERC argue that consideration of shale gas extraction in New York State is speculative because the SGEIS is currently under review by NYSDEC. Simply because a plan is subject to regulatory review does not render it speculative. Quite the contrary, such review renders it reasonably foreseeable.</p> <p>Significantly, the DEIS acknowledges the breadth of potential impacts resulting from the proposed project which require evaluation pursuant to the National Environmental Policy Act, 48 CFR, Sec. 1508 et. seq. (NEPA), which states:</p> <p>Three types of projects (past, present and reasonably foreseeable projects) could potentially contribute to cumulative impacts when considered with the proposed projects. These projects include Marcellus Shale development (wells and gathering systems); natural gas facilities that are not under the Commission's jurisdiction; other FERC jurisdictional natural gas pipelines; and unrelated actions such as residential and industrial developments... (DEIS, p. ES-10.)</p> <p>However, in text that immediately follows, FERC purports to excuse consideration of the impact of shale gas development in New York based on the incorrect and misleading assertion that "hydraulic fracturing is currently prohibited in New York" (DEIS, p. ES-10). See also the discussion at p. 5-15 stating: "Development of the Marcellus Shale is expected to continue in proximity to, and during construction and operation of, portions of the pipeline project in Pennsylvania (hydraulic fracturing of the Marcellus Shale is currently prohibited in New York)."</p> <p>Hydraulic fracturing is not in fact prohibited in New York. Applicants can and have obtained permits for shale gas extraction involving low-volume hydraulic fracturing through the state's existing generic regulatory program issued in 1992. Indeed, recently drilled shale gas wells identified in the DEIS in Otsego County were fracked in this manner. Furthermore, as discussed above, NYSDEC is presently preparing an SGEIS that would permit high-volume hydraulic fracturing. Thus, the current allowances for gas development in New York State and the pending completion of a "generic" environmental impact statement for high volume hydraulic fracturing</p>

CO26-10

See the response to comment LA1-4. We have clarified in the final EIS that "high-volume" hydraulic fracturing is currently prohibited in New York. We have updated section 4.13 of the EIS regarding development of the Marcellus Shale to estimate the extent of production required to support the capacity of the proposed projects. Specifically, this includes new wells within the Susquehanna County, Pennsylvania supply area that would be needed to supply and sustain the Constitution pipeline given that production at natural gas wells may decline over the long-term.

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by NYSDEC clearly indicate that it is reasonably foreseeable that gas well development in the Marcellus and Utica Shale will occur in New York. To ignore the potential impacts of these future activities violates federal requirements for environmental review.

B. Foreseeable Induced Shale Gas Development Must Be Considered.

The DEIS addresses only "existing" gas projects or projects that are currently proposed rather than foreseeable future Marcellus and Utica Shale development. For example, Table 4.13.1 (DEIS, p. 4-204) limits consideration of cumulative impacts to a short list of "existing and proposed" activities. Similarly, Sections 4.13.1.2 and 4.13.1.3 only address existing or currently proposed wells and gathering line systems, ignoring any consideration of gas wells or related infrastructure that could be permitted or induced by the pipeline in the future. (See DEIS pp. 4-202 to 4-232; passim.) Attempting to explain these omissions, FERC asserts:

A more specific analysis of Marcellus Shale upstream facilities is outside the scope of this analysis **because the exact location, scale, and timing of future facilities are unknown.** (DEIS, page 4-214; emphasis added.)

On its face, this conflicts with NEPA policy and federal regulations, which require an analysis of the full range of a project's impacts "whether direct, indirect, or cumulative." (Id., 40 C.F.R. § 1508.8.) Under NEPA, indirect impacts are defined as those that occur "later in time or farther removed in distance" and may include

...growth inducing effects and other effects related to **induced changes in the pattern of land use**...and related effects on air and water and other natural systems, including ecosystems. (40 C.F.R. § 1508.8; emphasis added.)

Despite this definition, the DEIS systematically fails to address the indirect impacts of induced gas development, specifically the extent to which the presence of the proposed pipeline will encourage and facilitate the development of new gas wells, compressor stations, and related infrastructure which could attach to the pipeline as an open-access facility. The DEIS also fails to consider how environmental impacts of the pipeline may be "cumulated" with the impacts of gas development generally in the Marcellus and Utica Shale regions. FERC incorrectly limits its analysis to short- and long-term impacts resulting from construction of the proposed pipeline, ignoring the potential for future and induced development of gas wells and related infrastructure in New York and Pennsylvania. (See e.g. Sections 4.13 and 5.1.) This is legally and factually insufficient.

The assertion by FERC that meaningful analysis of future impacts is unnecessary because the "location, scale, and timing" of those impacts is not precisely known is inconsistent with the very definition of an indirect impact under NEPA, which specifically contemplates effects that occur "later in time and farther removed in distance" and effects related to "induced changes in the pattern of land use." (Citations, above.) The analysis of such induced effects occurring in the future and at a distance clearly must involve estimates of future effects and general development patterns, inasmuch as the exact spatial and temporal characteristics of such future effects can almost never be precisely known. Indeed, if the general analysis of potential growth patterns

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were to be precluded from consideration, indirect and cumulative impacts would be essentially impossible to analyze for virtually any activity.

Clearly, FERC is not absolved from considering impacts for which the exact "location, scale, and timing" are unknown where those impacts are foreseeable. With respect to the potential for induced shale gas development, it is reasonable and necessary that the DEIS set forth numeric estimates of well pads and other related infrastructure that can be reasonably anticipated in the vicinity of the proposed pipeline, and from this generate estimates of environmental impact to lands and natural systems. The failure of FERC to make any effort whatsoever to conduct such an analysis in the DEIS constitutes a blanket failure by FERC to meet its obligations under NEPA in violation of federal law.

Similarly, pursuant to 40 C.F.R. § 1508.7, cumulative impacts are defined as "the incremental impact of the action when added to other past, present, and reasonably foreseeable future actions regardless of what agency (Federal or non-Federal) or person undertakes such other actions." As previously discussed, it is reasonably foreseeable that gas well development in the Marcellus and Utica Shale will occur in proximity to the Constitution Pipeline based on planning for shale gas extraction by regulators in both New York and Pennsylvania, the demonstrated pace of gas extraction underway in Pennsylvania, and regulatory action currently under review by the NYSDEC. Again, to ignore the potential cumulative impacts of these foreseeable developments stands in clear violation of NEPA.

CO26-11

C. Rational Consideration of Adverse Impacts Requires a Build-Out Analysis.

To comply with NEPA, the DEIS must contain a quantitative analysis of reasonably foreseeable impacts, including induced changes, both "upstream" and "downstream" of the proposed project. This should include a full build-out analysis of potential "upstream" gas development and related infrastructure in the region impacted by the pipeline, including an estimate of gas wells, well pads, flow back pits, water impoundments, gathering lines, processing plants, compressor stations, and other features. The EIS should also consider the impact of reasonably foreseeable "downstream" facilities and uses along the pipeline corridor such as local distribution networks, peak shaving plants, facilities for liquefied natural gas (LNG) production, storage, and export. The build-out analysis should include a comprehensive assessment of potential indirect and cumulative adverse impacts, including but not limited to air and water quality, greenhouse gas emissions due to combustion and leakage, wildlife and habitat, ecosystem functions and fragmentation, health and safety, and economic effects.

FERC's failure to comply with NEPA by refusing to conduct a full analysis of foreseeable impacts is compounded by the fact that the NYSDEC has specifically requested that such impacts be considered. In scoping comments dated November 7, 2012, Patricia Desnoyers, Esq. of the New York State DEC, Office of the General Counsel, specially states:

...the draft EIS must evaluate whether the pipeline would be reasonably available for supply and distribution for communities along the pipeline route **and whether the pipeline could reasonably serve as a collection line for additional supply from the New York Marcellus and Utica Shale formations.** Since the location of the Proposed Project route has a high potential for development of natural gas extraction from

CO26-11

See the response to comments FA4-45, LA1-4, and CO26-10. The proposed projects would not depend upon, nor could they be a major conduit for, natural gas supplies developed in New York whether or not the State of New York ultimately allows high-volume hydraulic fracturing. Given these factors, we conclude that the proposed projects would not reasonably serve as a major collector line for additional supply from the New York Marcellus and Utica Shale formations and therefore would not induce natural gas development within New York. Completion of the FERC's EIS for this project is not dependent on the NYSDEC's completion of its programmatic SGEIS for high volume hydraulic fracturing.

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Marcellus and Utica Shale formations, as indicated in the *revised NYSDEC draft Supplemental Generic Environmental Impact Statement on the Oil, Gas and Solution Mining Regulatory Program*, **the draft EIS must evaluate the cumulative environmental impacts associated with these potential activities.** (Emphasis added.)

Otsego 2000 strongly concurs with NYSDEC that the impacts of Marcellus and Utica shale gas extraction development in New York State must be evaluated in the DEIS. The discussion of cumulative impacts contained in section 4.13.1, which lacks any quantitative assessment of gas development potential in New York State, fails to satisfy the legal requirements for such an analysis.

A good faith effort must be made to evaluate the indirect and cumulative impacts of Marcellus and Utica Shale extraction in New York State that could be induced or facilitated by the pipeline. Accordingly, submitted with these comments and incorporated by reference in their entirety are the comments submitted by Otsego 2000 and signatory organizations to the NYSDEC with respect to the *draft Supplemental Generic Environmental Impact Statement on the Oil, Gas and Solution Mining Regulatory Program*, with exhibits, filed by Otsego 2000 and dated January 10, 2013, January 10, 2012, and December 30, 2009, respectively. Review of the proposed projects should not be considered in isolation from the broader analysis of shale gas development currently underway and should therefore await completion of the pending SGEIS by the NYSDEC.

CO26-12

D. Consideration of All Other Impacts Is Entirely Conclusory, Lacking Any Evidentiary Support.

The EIS reflects a disappointing pattern of dismissal of each and every negative environmental impact without adequate analysis or supporting evidence. Repeatedly, the EIS states an environmental risk then concludes that the risk is minor or "less than significant" based on one of three points. The EIS uniformly concludes that any negative impact is short-term, that the risk will be regulated by another permit or regulatory agency, or that the project will comply with "best management practices." These conclusions are offered repeatedly with respect to all impacts without citation of any studies, specified laws, or best management practices that will be applied. The issues purportedly resolved in this summary fashion constitute major impacts, including but not limited to the following:

- FERC concludes that significant geological and paleontological resource impacts could be "adequately minimized" without specifying how this would be done. (DEIS, Sec. 5.1.1.)
- Potential impacts on soils would be "avoided or effectively mitigated" based on unspecified measures that are not disclosed, analyzed or explained in any way. (DEIS, Sec. 5.1.2.)
- FERC concludes that water resource impacts could be "avoided, minimized or mitigated" while conceding that the Applicant has not yet identified water wells and springs within 150 feet of the proposed pipeline and has not completed field studies for the contractor yards that will be needed. (DEIS, Sec. 5.1.3.)

CO26-12

The comments regarding lack of details and a lack of a basis for conclusions reference section 5 of the EIS are noted. Section 5 is a summary containing our conclusions and recommendations, not a detailed explanation of our findings. Detailed discussions for the resources and issues listed in comment CO26-12 and the basis for our conclusions are contained in section 4 of the EIS.

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- Regarding the protection of surface waters, FERC simply admonishes that impacts are to be avoided “to the extent possible” without specifying what that might mean. (Id.)
- It is claimed that wetlands impacts can be “effectively minimized or mitigated” despite the fact that significant portions of the proposed corridor, which include wetlands, have not been surveyed and delineated by on-the-ground inspection. (DEIS, Sec. 5.1.4.)
- Ecological consequences of the project include impacts to over 1,000 acres of “upland” forest (more than 57% of the project) and the permanent removal of 471 acres of forest; impacts to 91 acres of wetlands, including 32 acres of forested wetlands and the permanent conversion of 15.8 acres of wetland; fragmentation along the linear corridor and permanent division of interior forest habitat; the construction of 54 permanent access roads, and 277 water crossings. (DEIS, Sec. 5.1.5.) The DEIS concludes without any references to scientific literature or meaningful analysis of environmental impacts relating to wildlife, habitat fragmentation, or invasive species that these impacts will be short-term and not significant. Although preparation of an Upland Forest Mitigation Plan is recommended, no required content is provided and no document has been offered for public comment. (DEIS, Sec. 5.1.5.)
- Many adverse impacts on wildlife and aquatic resources will be long-term or permanent; FERC concludes these impacts will be minimized to the extent “feasible” without disclosing what this means, and concludes that none of these impacts would be “adverse” without citation to any plans or reports. (DEIS, Sec. 5.1.6.)
- Although federally listed or proposed species and 19 other candidate, state-listed, or special concern species will be impacted, FERC concludes that adverse impacts would be “adequately avoided or minimized” without discussion of specific mitigation plans. (DEIS, Sec. 5.1.7.)
- Adverse impacts on critical land use, recreation, special interest and visual resources are also claimed to be “adequately minimized” without specification of how this will be accomplished; FERC simply concludes that it does not “consider these visual impacts to be significant overall” without discussing or elaborating on how significance is defined. (DEIS, Sec. 5.1.8.)
- Negative impacts on property values are simply rejected based on “available studies” however the studies are not cited or discussed. Claims of long-term socioeconomic effects based on tax revenues are mentioned without analysis of impacts on the existing tax base based on the current economy of the region. (DEIS, Sec 5.1.9.)
- Studies of impacts on cultural resources have not been completed, yet FERC concludes that any adverse effects on cultural resources would be “appropriately” mitigated. This is clearly insufficient analysis. (DEIS, Sec.1.10.)

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- Adverse air quality and greenhouse gas emissions are summarily rejected by reference to compliance with existing air emissions standards. FERC concludes that in “the unlikely event that these standards are exceeded, the necessary modifications would be implemented to ensure public safety.” This conclusion is written in a vacuum, ignoring the numerous reports of significant emissions, including methane leakage from pipeline and compressor stations throughout the life cycle of similar projects. (DEIS, Sec. 5.1.11.)
- Noise impacts are summarily rejected. FERC claims simply that impacts will be “minimized or mitigated” without identifying specifics. (Id.)
- Safety and emergency response are deemed adequate based on reference to future inspections on an “ongoing” basis and identification of fire, police and public officials who will be called upon to respond to an emergency. These provisions lack all specificity and do not provide any guidance as to planned inspections or emergency response. This is particularly troubling as the pipeline would be a permanent installation. The risks of leaks, rupture, explosion and lack of maintenance over time have been ignored. It is insufficient to conclude that this will “protect the public” without specifying how these matters will be handled over future decades. (DEIS, Sec. 5.1.12.)

The conclusion that the projects present no significant cumulative environmental impacts, unsupported by facts, evidence, or analysis, lacks credibility. The DEIS must be withdrawn on the ground that it did not fairly consider either the risks presented or the substance of the proposed mitigations. In short, the DEIS lacks sufficient detail to explain the basis for its conclusions with respect to all adverse environmental impacts.

CO26-13

III. ECOLOGICAL IMPACTS ARE IMPROPERLY DISMISSED.

A. The Selected Route Is Not Supported by Science and Is Inconsistent with Federal Guidelines.

The DEIS acknowledges that construction of the Constitution Pipeline would directly impact more than 1,000 acres of forest or 57% of the project, 91 acres of wetlands, and 277 water bodies. However, despite these significant impacts (which could actually be worse since field surveys have not been performed for much of the route) the actual harm caused by this proposed pipeline far exceeds these numeric estimates because of where the project is located—within an ecologically important “greenfield” corridor.

The proposed pipeline route needlessly passes through a contiguous landscape of hills, valleys, forests and streams, including pristine natural habitats that support rare species and lands that have benefited from regrowth over the past century. At a macroscopic level, these lands constitute a large, undivided, and biologically diverse mosaic important to the Upper Susquehanna River basin with critical connectivity to the northern Catskill region. Bisecting this special area with a 122-mile pipeline would severely damage a natural resource of state and regional significance.

CO26-13

See the response to comment FA4-3 regarding incomplete field surveys due to a lack of survey permission. Our evaluation of route alternatives, including alternatives that involve collocation with existing corridors, is provided in section 3 of the EIS. Section 3 has been updated for the final EIS. See the response to comment CO2-1 regarding Section 380.15(b) of the Commission’s siting guidelines.

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Contrary to federal and state guidelines, the Constitution Pipeline has not been proposed in or near a disturbed corridor, such as existing pipeline easement or adjacent to a transportation facility. Section 18 C.F.R. §380.15(d)(1) states with respect to pipeline projects: "The use, widening, or extension of existing rights-of-way must be considered in locating proposed facilities." Furthermore, in a letter from the NYSDEC dated September 25, 2013, Patricia J. Desnoyers, Esq. of the New York State DEC, Office of the General Counsel, specifically wrote:

NYSDEC requests that Constitution thoroughly analyze alternative routes that predominantly use existing utility corridors and rights-of-way (including road and railroad ROW) for all or most of the proposed pipeline route in New York.

However the proposed route fails to do this, with only 9% of the project collocated with existing facilities. Consequently, the route selected divides a significant ecological corridor, separating thousands of acres located between the proposed project and Interstate 88 from forests south of the project that are ecologically connected with Catskill Park.

Criteria in 18 C.F.R. §380.15(a) specifically require that the "The siting, construction, and maintenance of facilities shall be undertaken in a way that avoids or minimizes effects on scenic, historic, wildlife, and recreational values." Similarly, provisions in §380.15(d)(2) and (3) call for avoidance of forested areas, steep slopes, wetlands, scenic lands, and areas that support wildlife. Nonetheless the proposed project, which would involve high-impact construction methods including blasting and trenching of waterways, traverses interior forests, steep slopes, high-quality wetlands, and other sensitive habitat. Despite self-serving conclusions in the DEIS, none of these impacts have been minimized.

CO26-14

B. The DEIS Fails to Consider the Adverse Impacts of Ecosystem Fragmentation.

The DEIS fails to consider the full set of ecological impacts associated with construction of a linear pipeline corridor upon wildlife and habitat, rare species, and the integrity of ecosystems. Citing information supplied by the Applicant, the DEIS accepts that the minimum size of an interior forest block capable of supporting interior forest birds is 35 acres. Following this, the document concedes that the pipeline project would result in 55 permanent remnant blocks that are less than 35 acres in size each. (DEIS, Section 4.53, p. 4-70.) However, the DEIS then misleadingly reports that construction activities would impact only 439.7 acres of interior forest habitat and result in the permanent loss of only 217.9 acres of interior forest. (DEIS, p. 4-71.) This appears to ignore the remnant blocks, which no longer provide functional habitat for interior birds. The DEIS does not report the size of the 55 individual forest block remnants, however if a mean size of 17.5 acres is assumed, then a total of nearly 1000 acres of interior forest habitat capable of supporting interior forest birds could be lost, in addition to lands that are directly impacted by construction. Depending on the size of individual forest block remnants, this number could be even higher. By failing to fully account for the loss of functional interior forest land, the DEIS has underestimated environmental harm that would be caused by the project. The DEIS also fails to fully consider the substantial negative impacts that the linear corridor will have upon wildlife, erroneously suggesting that the cleared pipeline easement may even have beneficial impacts as open space. For example in Section 4.6.1.3, FERC states:

CO26-14

We have updated section 4.5.3 of the EIS to reflect indirect impacts that would occur to adjacent tracts of interior forest that would not be directly affected by clearing. Many wildlife species, such as deer and wild turkey, may benefit from edge habitats. Forest fragmentation could result in the introduction of parasitic brown headed cowbirds. However, as discussed in section 4.5.3, we included a recommendation that Constitution develop an upland forest mitigation plan which would also be designed to include measures protective of migratory birds. We have updated sections 4.5 and 4.6.1 of the EIS to reflect the provisions of the preliminary plan filed by Constitution. See the response to comment FA4-9 regarding invasive species. See the responses to comments FA4-16 and FA4-21 regarding alternative M. We acknowledge that in some cases, previously disturbed wetlands or those wetlands along existing corridors may generally be of lower quality. However, based on our analysis presented in section 3.4.1, impacts on palustrine forested (PFO) wetlands along the proposed route would be similar to or less than those associated with alternative M. PFO wetlands typically are of higher quality than palustrine emergent (PEM) or palustrine scrub-shrub (PSS) wetlands, and impacts on PFO wetlands would represent either long-term or permanent wetland impacts.

Comments provided directly by the Henry S. Kernan Land Trust and their agents regarding the subject property, which encompass the topics listed in comment CO26-14, are addressed in the responses to comments CO4, CO5, CO6, CO9, CO12, and CO24.

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Maintenance of the permanent right-of-way would create smaller contiguous tracts of forest habitat and might reduce available feeding and nesting habitat for certain migratory bird species. The loss of interior forest habitat could result in mobile species permanently populating adjacent habitats, which could increase competition and stress on a long-term basis. **However, the creation of additional edge habitat could benefit certain species by providing travel corridors and additional forage habitat.** (Emphasis added.)

The continued fragmentation of forest areas may benefit certain opportunistic species, particularly predatory or parasitic species such as skunks, raccoons, and brown cowbirds that target interior nesting birds. However this cannot be construed as an environmental benefit. Due to changes in land use and fragmentation that has already occurred, there is no shortage of edge habitat in New York. Yet there is definitely a limited amount of interior forest habitat in the state which continues to diminish—a problem that will only worsen if the proposed 122-mile long Constitution Pipeline project is approved. The U.S.G.S. Breeding Bird Survey has documented major downward trends in interior forest bird populations, including within New York State. Thus, even if the Applicant eventually submits an Upland Forest Mitigation Plan (which to date has not been produced) the fact remains that these are trends that cannot be reversed or mitigated with actions that continue to fragment forest habitat. By avoiding a greenfield route, however, these impacts could be eliminated.

Permanently maintained linear corridors also encourage the spread of invasive plants, an effect exacerbated by soil disturbance and vehicles used during and after construction. Furthermore, once established, invasive plants such as phragmites, purple loosestrife, Japanese knotweed, and stilt-grass are difficult to eliminate and very likely to spread into other areas, including sensitive wetlands. Herbicide treatment is only partially effective and its application can be harmful to wildlife, especially amphibians. Despite the widespread failure of such measures, the DEIS naively asserts that the spread of invasive plants will be controlled and mitigated if the project is approved. Again, a non-greenfield route would significantly reduce these impacts.

With respect to wetland and aquatic systems, the DEIS fails to acknowledge the obvious difference between features that are part of an undisturbed landscape and those which abut developed areas. For example, in comparing the proposed route to alternatives, the DEIS concludes that wetland impacts would be greater along the I-88 corridor, without giving any consideration to the fact that wetlands and aquatic habitat in an undisturbed location in context with surrounding habitat have much greater environmental value than impacted wetlands adjacent to a major road.

A prime example of this type of flawed analysis is in the Applicant's consideration of the Henry S. Kernan Land Trust property, a 930-acre parcel located in Otsego and Delaware counties that has been protected and managed since 1946 and remains in a trust to ensure its continued conservation. The subject of several articles appearing in the NYSDEC's *Conservationist* magazine, the property has been identified by the NYS Natural Heritage Program as one of New York's largest, ecologically pristine sphagnum bogs outside of the Adirondacks. The Kernan Land Trust property is a premier example of unspoiled biodiversity, free of invasive plants, supporting an amazing collection of unique species including carnivorous plants, several native orchids, dwarf mistletoe, and bog rosemary. Yet despite its outstanding natural attributes, the

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parcel falls within the proposed Constitution Pipeline corridor. According to the director of the NYS Invasive Species Institute at Cornell University, a pipeline easement through the property would inevitably lead to infestation of this sensitive wetland system with invasive species. There is no justification for this when viable alternative routes exist.

CO26-15

C. Induced and Cumulative Ecological Impacts of Shale Gas Extraction Are Ignored.

While the potential environmental impacts of the Constitution Pipeline are adverse and significant, even more damaging are the ecological impacts of shale gas extraction that may be induced by the project and the cumulative impacts of the project and foreseeable gas extraction in the region. As discussed above, it is entirely unacceptable and in violation of NEPA that FERC has not produced in the DEIS an estimate of the amount of gas wells and related infrastructure that is reasonably foreseeable if the pipeline project is constructed.

High-volume fracking typically follows a grid pattern of well pads and infrastructure that proliferates across the landscape. Current spacing regulations in New York State allow a well pad with multiple wells to be installed every square mile, with infill wells also permitted. The cumulative impacts can be profound. Loss of functional habitat, fragmentation, negative edge effects, invasive species, impacts to wildlife populations due to intense activity, and harm to plant and animal species as a result of air, water, or soil contamination are all impacts that can be expected if fracking takes place around the pipeline. Most vulnerable to the impacts of widespread shale gas extraction are those species with small geographic ranges that overlap the Marcellus and Utica shale regions. See *"Hydraulic Fracturing Threats to Species with Restricted Geographic Ranges in the Eastern United States,"* (J. Gillen, Erik Kiviat, *Environmental Practices*, August, 2012; doi:10.1017/S1466046612000361.)

Disturbingly, many of these impacts are most acute in forests. This is of great concern because forests, which comprise much of upstate New York's most intact habitat, are essential for sustaining wildlife populations and maintaining biodiversity. To this point, The Nature Conservancy (TNC) produced a report which analyzed the potential impacts of hydrofracking in Tioga County, New York, titled *"An Assessment of Potential Impacts of High Volume Hydraulic Fracturing on Forest Resources"* (Cara Lee, et al; Dec 19, 2011). A similar analysis of lands in the vicinity of the Constitution Pipeline should be performed for Broome, Chenango, Delaware, Otsego, and Schoharie Counties. Also useful to understanding the large scale landscape consequences of shale gas extraction is the U.S.G.S. report titled *"Landscape Consequences of Natural Gas Extraction in Bradford and Washington Counties, Pennsylvania, 2004-2010"* (E.T. Sionecker, et al; Open-File Report 2012-1154).

In addition to direct impacts of the Constitution Pipeline on natural resources, the threat posed to wildlife, interior forests, and other natural communities around the pipeline due to induced shale gas development and cumulative impacts of such development makes this project and its greenfield route highly objectionable.

CO26-15 See the response to comment CO26-11.

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CO26-16

IV. ANALYSIS OF ALTERNATIVES IS SIGNIFICANTLY FLAWED.

A. Erroneous Comparisons between Transported and Produced Energy Are Presented.

In comparing the impacts of the pipeline to alternative energy sources, FERC makes an erroneous comparison between **produced** and **transported** energy. Specifically, in section 3.1.2.3, FERC attempts to calculate the physical footprint associated with the number of wind turbines or solar farms that would be needed to produce the equivalent amount of energy that could be carried on a daily basis through the Constitution Pipeline (650,000 Dth/d or 190,496.4 MWH). From this, FERC concludes that the land area and physical impact of renewable energy is far more damaging than a gas pipeline. However wind turbines and solar panels actually **produce** energy, whereas a gas pipeline is merely a conduit for the **transport** of energy that is produced elsewhere. Natural gas would have to spontaneously appear within the pipeline for such a comparison to be valid.

A legitimate comparison between the physical footprint of energy provided by the pipeline and renewable alternatives would require calculating the total physical footprint associated with the **production** of natural gas. This would have to include the footprint of gas well pads, flow-back pits, water impoundments, gathering lines, processing equipment, and other infrastructure needed to generate 650,000 Dth/d of energy. Furthermore, the production volumes from fracked wells in the Marcellus typically drop off sharply after the first year of operation, whereas the lifespan of installed wind and solar technology is 25 years or more. Therefore a valid comparison of natural gas to renewables would require estimating the expanding footprint of gas wells and infrastructure needed to produce 650,000 Dth/d over this extended time period. Such a comparison to renewables, which generate electricity directly, would also have to consider the physical impact of gas-fired power plants that are required to convert gas within the Constitution Pipeline to electrical power.

Conversely, if a comparison of transported energy is made, only the impact of electrical power lines should be considered for renewables; and arguably those lines already exist or could be accommodated by collocation with existing lines. In any event, neither those power lines (nor the wind and solar sources of energy generation that supply them) would need to be located in the sensitive corridor selected for the Constitution Pipeline.

Based on this erroneous comparison between produced and transported energy, FERC concludes in section 3.1.2.3 that renewables would result in "greater impacts upon visual, vegetation, and wildlife resources," a determination that is on its face absurd. This erroneous comparison is a fundamental flaw of the DEIS which must be corrected.

CO26-17

B. Analysis of Alternatives Is Not Supported by Facts.

The DEIS analysis of alternatives for bringing gas from Pennsylvania to New England are incomplete and do not consider optimal combinations of pipeline sharing and collocation. For example, Figures 3.2.3-1 and 3.2.3-2 depict alternatives that require "greenfield" components involving additional new corridors. However, it appears that permutations exist that have not been considered, which would eliminate or minimize the need for these types of "greenfield"

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CO26-16

The comment regarding the comparison between produced energy and transported energy is noted. However, Constitution is proposing the transportation of natural gas that is currently being produced and developed in northern Pennsylvania. We discuss alternate energy sources, including wind and solar power, but there are no known plans to build such facilities that could produce the amount of energy on a scale that would be transported by the Constitution pipeline or that would satisfy the demand of customers of natural gas in New York and New England. See the response to comment CO26-18 regarding other, recently proposed projects that could potentially alter service area and end user markets. We acknowledge that while the EIS evaluates the potential impacts of newly produced energy for sources such as wind and solar power, those sources are not existing, would be theoretical, and would have to be built. Conversely, the natural gas supply in Susquehanna County, Pennsylvania is existing and available. This production would continue regardless of whether the Constitution pipeline project is built or not. Additionally, as noted both in the EIS and by the commentor, new electric transmission lines (potentially hundreds of miles long) would be required to transport electricity from any new wind or solar production areas to the end users resulting in its own set of environmental impacts. We have updated section 4.13.1 of the EIS to reflect Marcellus Shale development that would be required to provide and sustain natural gas flow from the Pennsylvania production area into the Constitution pipeline over the long-term.

CO26-17

The alternative routes depicted in figures 3.2.3-1 (TGP 300 – TGP 200) and 3.2.3-2 (Dominion) would be essentially collocated and largely collocated with existing corridors, respectively. As discussed in sections 3.2 and 3.3 of the EIS, we evaluated multiple options for system and major collocated alternatives that would largely eliminate the need for greenfield construction.

COMPANIES AND ORGANIZATIONS

CO26 – Otsego 2000 (cont'd)

CO26-17
(cont'd)

The Millennium-Dominion-TGP alternative would be approximately 232 miles long, almost double the length of the proposed route. While this alternative would be largely collocated with existing corridors, it would still require substantial new construction and permanent rights-of-way, impacts on waterbodies, wetlands, forest (although largely not interior forest), and landowners. Based on our review of aerial photography, the Millennium (approximately 70 feet wide), Dominion (approximately 40 feet wide), and TGP 200 (approximately 60 feet wide) pipelines' maintained permanent rights-of-way are too small to provide considerable, already cleared workspace for a new, adjacent pipeline. The commentor misinterprets that a new pipeline can be installed within an existing easement and can eliminate environmental impacts. Pipeline easements are generally established at the minimum width necessary to operate the pipeline in a safe manner. Any new pipeline adjacent to an existing one would require at least 75 – 100 feet of construction right-of-way. Given construction considerations limiting the use of heavy equipment over or near an active pipeline (or use of special construction techniques), we estimate that only 25 feet or less of the existing permanent rights-of-way may be available to provide overlapping construction or permanent rights-of-way for a new pipeline project. We used Constitution's proposed nominal construction right-of-way width of 110 feet in non-agricultural uplands as a baseline for comparison, and because the Millennium-Dominion-TGP alternative route would be approximately 108 miles longer than the proposed route, 45 percent more land disturbance would occur with implementation of the Millennium-Dominion-TGP collocated alternative even accounting for 25 feet of overlap with existing rights-of-way during construction. New easement agreements would also have to be negotiated for the construction and permanent rights-of-way and based on regional experience it is very unlikely that all of the landowners that would be located along this 232-mile-long corridor would voluntarily agree to provide easements, thereby also resulting in eminent domain proceedings. We conclude that the Millennium-Dominion-TGP collocated alternative is not preferable to the proposed pipeline route for these reasons.

COMPANIES AND ORGANIZATIONS

CO26 – Otsego 2000 (cont'd)

CO26-17
(cont'd)

We also evaluated route alternatives proceeding east toward New York City (i.e., Millennium, TGP 300, and Transco Leidy) and potentially from the New York City area northeast to New England (i.e., Algonquin) in section 3.2.3.3 of the EIS. The proposed projects have been designed to deliver natural gas to customers in New York City (via the existing Iroquois pipeline) and to New England (via the existing TGP 200 pipeline). While other pipelines may proceed in generally the same direction as the proposed end user locations, they would not connect to exactly the same end-user markets. This is particularly true for the TGP 200 New England market compared to the Algonquin New England Market. Our experience with past projects and a review of aerial photography indicated that connections from Millennium, TGP 300, or Transco Leidy to delivery points similar to Iroquois’ existing connections at Hunt’s Point in the South Bronx, New York and South Commack in Long Island, New York would not be feasible due to physical constraints and constructability issues in this congested area and as such they would not be preferable to the proposed projects. See the response to comment LA7-5 regarding other projects that could potentially affect the proposed projects’ delivery markets.

COMPANIES AND ORGANIZATIONS

CO26 – Otsego 2000 (cont'd)

S-324

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CO26-17
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impacts. One such alternative would be to transport gas west on (or collocated with) the TGP 300 pipeline and then northeast on (or collocated with) the Dominion Pipeline.

The Millennium-Dominion-TGP alternative described in section 3.3.2 and depicted in Figure 3.3.2-1 would achieve the purpose of minimizing “greenfield” impacts. However the DEIS rejects this route out of hand, claiming that it would have “greater total environmental impacts relative to the proposed pipeline.” Providing no environmental analysis to support this claim, FERC has failed to demonstrate that the proposed route for the Constitution Pipeline—which would entail blasting a new 120-mile corridor through heavily forested landscapes and repeated crossings over sensitive streams and wetlands—will in fact have lesser environmental impacts.

Although the Millennium-Dominion-TGP alternative would require more linear feet of pipe, it would be located almost entirely within existing easements and therefore eliminate sensitive “greenfield” impacts. Furthermore, although more landowners would be temporarily affected, those impacts would be within easements that already exist and for which rights to develop have already been secured. Eliminating the need for 120 miles of new corridor easements, taken by or under the threat of eminent domain and affecting hundreds of new landowners, ought to be a priority for FERC.

Finally, the DEIS has summarily dismissed the most obvious alternative for delivering gas from the fracking fields of Pennsylvania to New England, namely the transport of gas east on (or collocated with) the Millennium pipeline or TGP 300 pipeline and then northeast on (or collocated with) the Algonquin pipeline. Since one of the markets identified in the DEIS is downstate New York and New England, expansion of pipeline capacity within the Millennium or TGP 300 corridor is an obvious and the most direct solution.

However, without providing any supporting evidence, the DEIS simply concludes in section 3.2.3.3 that such a route would be “constrained by the high level of development within New York City and the surrounding area,” rejecting the alternative with little discussion. It should be noted that the Algonquin mainline does not actually enter New York City. Furthermore, no analysis of easement width or physical constraints has been provided to support the claim that existing development in the region creates a significant barrier precluding this obvious and direct solution. These are fundamental flaws in the DEIS, which must be corrected.

CO26-18

V. THE DEIS FAILS TO ACKNOWLEDGE PLANS FOR EXPORT, WHICH CONSTITUTES ILLEGAL SEGMENTATION.

It is widely known that one of the Applicants for the Constitution project, Iroquois Gas Transmission System (IGT), has issued an “open season” announcement regarding intentions to reverse flow of the Iroquois pipeline for delivery of gas north to Canada. As a result of this proposed IGT “South-to-North” (SoNo) project, much of the gas carried within the Constitution Pipeline will actually be exported outside of the United States. Although delivery to Canada is actually planned for 2016, no mention of this is included in the DEIS. In fact, FERC states in the DEIS:

CO26-18

The proposed Iroquois Gas Transmission (Iroquois) South to North Project (SoNo) and the proposed Tennessee Gas Pipeline (TGP) Northeast Energy Direct project both became known after the draft EIS was finalized. Both projects have been added to the discussion of cumulative impacts in section 4.13 of the final EIS. Both of these companies have conducted open seasons to gauge market interest. The Northeast Energy Direct Project requested pre-filing on September 15, 2014. The SoNo Project has not entered into the pre-filing process with the FERC. Neither project has filed a formal Certificate application. Based on publically available information from Iroquois and Kinder Morgan/TGP, both projects would be physically connected to Wright, New York, and may potentially receive natural gas from the Constitution pipeline if it is certificated. Iroquois’ project could potentially result in exportation of natural gas to Canada. Reversal of flow on the Iroquois pipeline could preclude delivery of some natural gas to New York City from Constitution’s connection at the Wright Compressor Station; however, Iroquois would still have to meet its contractual obligations to its end-users downstream in New York City. This means Iroquois could not abandon or terminate service to customers in New York solely to redirect gas to a market of its choosing. Iroquois’ SoNo project would require Commission approval, for which no application is present at this time. We have revised Section 4.13 of the EIS with this information.

COMPANIES AND ORGANIZATIONS

CO26 – Otsego 2000 (cont'd)

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CO26-18
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Constitution's application does not include provisions for the exportation of natural gas. Further, there are no existing or proposed natural gas exportation facilities located downstream of Constitution's project. Should such exportation facilities be proposed in the future downstream of Constitution's project, **which is speculative**, then any such proposal would be subject to a new and separate approval process from the U.S. Department of Energy (DOE), the FERC, and all other applicable permitting agencies. (DEIS, p. 1-10; emphasis added.)

This constitutes a clear misrepresentation of fact by both the Applicants and FERC, since there is no mention of plans to export the gas transmitted in the DEIS and the only proposed markets for the Constitution Pipeline mentioned in the DEIS are New York and New England. Furthermore, the claim that no proposed export facilities are located downstream of the Constitution Pipeline is blatantly false since reversal of the Iroquois pipeline anticipated in 2016 causes it to become an export facility. Clearly the consideration of exportation is not "speculative" in light of this announced project.

Failure to address reversal of the Iroquois line, as part of the Constitution Pipeline DEIS therefore constitutes improper segmentation of a clearly coordinated effort to transport gas outside of the United States. In addition, public comments by J. Hutton, Cabot Oil & Gas (4th Quarter 2012)

<https://archive.org/details/CabotOilGasCorporation4thQuarter2012ConferenceCall>) clearly indicate plans to provide system capacity for delivery of 75,000 Dth/d of gas to the proposed Cove Point LNG facility in Maryland for export. The DEIS must be substantially revised to address all proposed exports of gas that may be facilitated by the Constitution Pipeline.

Finally, although the DEIS acknowledges that the Boston area is one of the intended markets for gas carried by the Constitution Pipeline, FERC fails to discuss or even mention the proposed TGP Northeast Expansion project ("Bullet Line") which would involve construction of a new 150-mile long, 30-inch pipeline from the terminus of the Constitution Pipeline in Wright, New York to Dracut, Massachusetts. This project would effectively serve as an extension of the Constitution Pipeline. Accordingly, it too must be addressed in the DEIS.

CO26-19

VI. STATED ADVANTAGES OF INCREASED RELIANCE ON METHANE GAS ARE NOT SUPPORTED BY EVIDENCE.

The DEIS misleads the public when it concludes that the "the proposed projects would contribute to a cumulative improvement in regional air quality if a portion of the natural gas associated with the proposed projects displaces the use of other more polluting fossil fuels." (DEIS, Sec. 4.13.6.) See also, the claim that "by utilizing cleaner-burning natural gas" in lieu of other fuels greenhouse gas emissions will be reduced. (DEIS, p.1-2.) These statements are not supported by evidence or facts. Indeed, the opposite is true. The primary method by which natural gas extraction occurs today—horizontal high-volume hydraulic fracturing—cannot conceivably be described as "clean" once the numerous environmental and human health problems associated with its production and distribution are considered, including contamination of air and water, habitat fragmentation, fracking waste disposal, earthquakes, methane leaks and explosions, and countless other impacts.

CO26-19

The EIS has been updated to clarify that the combustion of natural gas results in fewer emissions compared to combustion of other energy sources such as coal or fuel oil. We acknowledge that methane, a primary component of natural gas, is a potent greenhouse gas. We have updated section 4.13.1 of the EIS to reflect Marcellus Shale development that would be required to provide and sustain natural gas flow from the Pennsylvania production area into the Constitution pipeline over the long-term. We have also updated section 4.11.1 regarding methane leakage.

COMPANIES AND ORGANIZATIONS

CO26 – Otsego 2000 (cont'd)

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CO26-19
cont'd

Before FERC can rationally reach a conclusion that the projects taken together may have positive environmental effects, the DEIS must consider the cumulative environmental footprint of the projects. The DEIS would have to be revised to address the full life cycle of impacts associated with natural gas production and infrastructure, including gas well development, gathering lines, pipelines, compressor stations, industrial plants that produce and store liquefied natural gas (LNG) or compressed natural gas (CNG), fueling stations, and import/export facilities over the lifetime of the proposed projects. We submit that if the full environmental impacts of gas extraction and methane leakage were taken into account over the decades that the pipeline will be installed, reliance on natural gas would not be characterized as a "cumulative improvement." See e.g. the study commissioned by Senator Markey documenting severe ongoing pipeline methane leaks as infrastructure ages, *America Pays for Gas Leaks*, August 1, 2013.

Significantly, the DEIS also fails to address the findings of the International Energy Agency (IEA) that a large natural gas boom—even with improvements in place to reduce leakage—would eventually lead to greenhouse gas concentrations of 650 parts per million and a global temperature rise of 3.5 degrees Celsius, far exceeding the 2 degree Celsius limit which is critical to avoid the most severe effects of climate change.¹ Furthermore, a recent quantitative study found that current inventories by the EPA and the Emissions Database for Global Atmospheric Research (EDGAR) underestimate methane emissions nationally by a factor of 1.5 and 1.7 respectively.²

The same study also determined that regional methane emissions from extraction and processing may actually be five times worse than EDGAR estimates. These data are included in an even more recent study that found that national-scale methane emissions are about 5.4 +/- 1.8% of production.³ Even the low end of this range supports the results of independent analyses, which show that the climate-driving effects of shale gas development exceed coal when a twenty-year timeframe is appropriately considered.⁴ Thus, increased reliance on natural gas could advance rather than retard global warming. The failure of the DEIS to consider this data is another serious omission that must be corrected.

CO26-20

CONCLUSION

For all of the reasons stated above, the DEIS is premature, incomplete, unsupported by evidence and fails to adequately consider the direct, indirect, and cumulative impacts of the projects. The proposed projects are unnecessary and improperly located, with significant negative impacts that

¹ *Golden Rules for a Golden Age of Natural Gas—World Energy Outlook Special Report on Unconventional Gas*, International Energy Agency, WEO-2012, International Energy Agency, November 2012.

² *"Anthropogenic Emissions of Methane in the United States;"* Scot M. Miller, Steven C. Wofsy, Anna M. Michalak, Eric A. Kort, Arlyn E. Andrews, Sebastien C. Biraude, Edward J. Dlugokencky, Janusz Eluszkiewicz, Marc L. Fischer, Greet Janssens-Maenhout, Ben R. Miller, John B. Miller, Stephen A. Montzka, Thomas Nehrkorn, Colm Sweeney; October 2013.

³ *Methane Leaks from North American Natural Gas Systems*, Brandt et al., Science, 14 February 2014: Vol. 343, no. 6172, pp. 733-735, DOI: 10.1126/science.1247045

⁴ *Methane and the Greenhouse Gas Footprint of Natural Gas from Shale Formations*, Robert W. Howarth, Renee Santoro, Anthony Ingraffea; April 2011; *Venting and Leaking of Methane from Shale Gas Development: Response to Cathles et al.*, Robert W. Howarth, Renee Santoro, Anthony Ingraffea; January 2012.

CO26-20

See the response to comment CO26-1. We have revised the EIS with updated and new information where it has become available and based on comments received.

COMPANIES AND ORGANIZATIONS

CO26 – Otsego 2000 (cont'd)

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This submittal has also been submitted 3 times.

CO26-20
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cannot be mitigated. These defects in the DEIS are fundamental and pervasive. We request that FERC take no further action with respect to permitting these projects on the basis of this profoundly flawed DEIS.

Respectfully submitted,

Otsego 2000, Inc.



Nicole A. Dillingham, Esq.
President
Board of Directors

Keith W. Schue
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Enclosures

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S-327

COMPANIES AND ORGANIZATIONS

CO27 – Concerned Citizens of Trout Creek

S-328

20140407-5016 FERC PDF (Unofficial) 4/4/2014 9:51:38 PM

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April 4, 2014

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RE: Docket Nos. CP13-499-000 and CP13-502, NAN-2012-00449-UBR

CO27-1 The Concerned Citizens of Trout Creek is a group of concerned taxpaying landowners situate in the crux between the Villages of Walton, NY Masonville, NY and Sidney Center, NY. Located in Delaware County, New York, we would consider ourselves to be (as a group) called adjacent landowners along the pipeline route residing as close as 3 miles away and up to 10 miles away from the proposed route.
We are concerned with the Draft E.I.S. and its lack of attention to considering (in detail) the build-out and the infrastructure brought on by Hydro-Fracking for minerals including natural gas. We are concerned that this project promotes the hydro-fracking exploration of natural gas and we feel it is clearly evident with the strategic location of the input valves. This project (as are all FERC projects) is by nature and by law an open-access 124 mile long pipeline that is designed to be just that; open access.
With the infrastructure and permits already being applied for at the County level by local mineral speculators and entrepreneurs it has become clear to us at CCTC that this project will promote natural gas extraction.
We feel it is the duty of the FERC to study all of the cumulative impacts of the following: compressor stations, gathering lines, storage facilities, LNG processing and LNG Cracker Plants, produced water pits and containers and well flaring. Here at CCTC we expect a full review of the amount of well-pads both forecast and the amount of well pads expected based on already existing land-lease agreements scattered throughout the region within a 20 mile limit from both sides of the pipe and along the entire 124 mile run. We would also expect a full cumulative impact study on the truck traffic into and out of each well pad site taking into consideration the buildup of ground level ozone brought on by the traffic.

CO27-2 Here at CCTC we have carefully read the DEIS and we feel that the FERC has failed miserably in this regard and we would expect a re-written document with an ample commenting period to go with it.

CO27-3 Thank you for your consideration

Howard L Hannum _ Co Founder
Concerned Citizens of Trout Creek

CO27-1 See the response to comments FA1-1 and LA1-4.

CO27-2 The specifics of any future Marcellus Shale development is unknown and would be speculative. We discuss existing development in the project area. Attempting to predict the locations of future development and resultant truck traffic is beyond the scope of this NEPA analysis.

CO27-3 The commentor's statement regarding the draft EIS is noted. See the response to comment FA1-1 regarding extension of the comment period.

COMPANIES AND ORGANIZATIONS

CO28 – Concerned Citizens of Trout Creek

20140407-5021 FERC PDF (Unofficial) 4/5/2014 8:24:38 AM

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RE: Docket Nos. CP13-499 and CP13-502, NAN-2012-00449-UBR

CO28-1 Comment to the FERC regarding its failure to adequately address alternate access routes for the Constitution Pipeline Project in its Draft EIS document

Williams Partners has requested a certificate of public convenience so that they could have permission to literally blast (with dynamite) their way through 124 miles of virgin upper Pennsylvania and lower New York territory. Their claim is that the project is necessary in order to bring much needed Natural Gas product to markets in New York City and in and around the Boston, Massachusetts area.

The product coming from the gas fields of northern Pennsylvania has three already existing options as there are 3 major pipelines in place that are fully operational and have not reached their capacity according to various studies in various Northern Pennsylvania journals and publications. If Williams Partners needs to show a need for another line to those markets we here at CCTC would suggest the running of that fourth line in already existing rights of way and we would assume that such a line would be done much cheaper and be much more cost-effective to do so. We here at CCTC would also opine that such a decision would be much better (in an all-round decision) than to blast through 124 miles of virgin territory.

Here at CCTC we feel that the Draft EIS document fails to adequately address these alternate access capabilities. We do not see the proper studies in the document, and the document is devoid of proper alternate access routes and already existing routing capabilities through those already existing rights of way. We would expect a re-written document that contains this information and we would hope for an adequate time to both study the new document and comment publicly on said document.

Thank you

Howard Hannum, Co-Founder
Concerned Citizens Of Trout Creek

CO28-1 Section 3.2.2 of the EIS discusses the use of existing pipeline systems to meet the purpose and need of the projects. Section 3.3 discusses collocation with existing pipeline rights-of-way.

COMPANIES AND ORGANIZATIONS

CO29 – Concerned Citizens of Trout Creek

20140407-5023 FERC PDF (Unofficial) 4/5/2014 10:17:04 AM

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RE: Docket Nos. CP13-499, CP13-502, NAN-2012-00449-UBR

CO29-1

Comment to the FERC and USACE regarding their combined failure to have proper crowd-controls in place at their public hearing of April 1, 2014 where verbal abuse led to chest-bumping which led to physical altercation which led to a "recess" call by the chair and ultimately resulted in the disenfranchising of nearly 3 dozen directly affected landowners that did not get a chance to speak.

The Concerned Citizens of Trout Creek is a group of taxpaying landowners that reside along the proposed pipeline route. We as a group refer to ourselves as a group of adjacent landowners that live within 3 miles of and up to 10 miles away from the proposed route. We have intervener status with this project.

Let the record show that the CCTC would like to lodge a formal complaint with both the FERC and USACE who hosted a public hearing at Oneonta High School in Oneonta, New York on April 1, 2014. Due to the combined failures to control violent crowd behavior, up to three dozen local directly affected land owners did not get an opportunity to speak.

Let the record also show that the CCTC requests a "re-do" of the Oneonta hearing and we would expect that the current 4 member panel would not be allowed to chair such an event until they have all been properly trained to control the outbursts brought on by imported bullies that threaten local residents trying to take part in the process.

Bus loads of thugs from up to 125 miles away and from parts of North New Jersey were brought in to not only disrupt but verbally and physically abuse the local residents as they left the speaking area. Williams Partners treated the group to a meal before hand and passed out hats and shirts to ensure that the attire was representing the Constitution Pipeline's best interest.

Verbal abuse led to chest bumping the local residents in the aisles. Chest bumping led to cat-calls and cat-calls led to physical abuse that spilled over to the parking lot. The chair felt compelled to put the hearing in recess. All of the actions described above are well document through 3 videos of the event and countless personal accounts lodged as complaints. What is not heavily documented however is that the actions of the imported bullies led to the disenfranchised local directly affected landowners that were afraid to step to the microphone, two of whom declined or "passed" when called. This is completely unacceptable. Our members are senior and must "arrange" transportation to a hearing like this. They don't have the ability to just jump in the car and drive. You have prevented these voices from being heard and YOU have kept their

CO29-1

The commentor's statements are noted. The FERC staff arranged for police presence during each of the draft EIS comment meetings. Local police were on hand during the meeting in Oneonta and restrained any disagreement or quarrel between parties from further escalation. The panel made several statements to the attendees requesting respect and order during the meeting. We reiterate here, as the FERC staff did at the comment meetings, that offering oral comments are merely another mode of submitting comments to the FERC, and are not prioritized in any way by the FERC staff or the Commissioners over other methods. Any individuals that chose not to speak had the opportunity to provide written comments at the meetings themselves, online, or by U.S. mail. All comments, regardless of how they are provided, were weighed and considered equally. The FERC staff allowed all persons signed up to speak a chance to speak if they so chose.

COMPANIES AND ORGANIZATIONS

CO29 – Concerned Citizens of Trout Creek (cont’d)

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CO29-1
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voices out of the process, a process that is designed to have the local voices heard and NOT a process that is designed to cater to outside non local thugs.

Here at CCTC we understand the nature of hearings and we understand cheering and jeering between speakers. We do not however accept cat-calling and loud obnoxious behavior because we have seen too frequently that it always leads to violence. When the violence spills over to the parking lot it becomes a police matter. Seven members of CCTC did not attend the Afton hearing the following night as they were so shaken from the night before, they felt threatened and stayed away. Up to 2 dozen local residents not affiliated with CCTC would like their voices added to this complaint as well.

Here at CCTC we demand a re-do of the Oneonta Hearing. We expect a full investigation into the Williams' bullying techniques. We would like the 4 member panel to held accountable. We would expect the 4 member panel would not be able to host a meeting of this nature until they have been properly trained in crowd control, especially the kind that was needed on Tuesday evening. We request a re-do of the Oneonta Hearing in respect for the disenfranchised locally affected landowners that did not get a chance to speak.

Thank you,
Howard L Hannum, Co-Founder
Concerned Citizens of Trout Creek

COMPANIES AND ORGANIZATIONS

CO30 – Concerned Citizens of Trout Creek

S-332

20140407-5027 FERC PDF (Unofficial) 4/5/2014 11:58:24 AM

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RE: Docket Nos. CP-13-499 and CP-502 and NAN-2012-00449-UBR

- CO30-1 Comment to the FERC on the Draft EIS document regarding the uses and effects of dynamite in the Construction of the Constitution Pipeline project.
- Concerned Citizens of Trout Creek is a group of taxpaying land owners that reside along the pipeline route. We refer to ourselves as a group of adjacent landowners in that we live anywhere from 3 miles to 10 miles away from the proposed route.
- The use of dynamite in this project is very disconcerting to the CCTC and its members. We are aware of the solid bedrock located along the stretch from Unadilla, NY through much of Sidney Center and then most of Franklin. We are concerned that the Draft EIS fails to address the impacts of dynamiting through bedrock in those areas where running waters ravaged that valley during three 100 year floods that took place between 2006 and 2012. The last of which prompted our Governor to state publicly at the time- " these drastic weather patterns in the Northeast are apparently going to become the norm and the tri-state area must wake up to that" he sated that during a press conference in the days following Hurricane Irene.
- CO30-2 The CCTC is aware that dynamiting bedrock will cause run-off and erosion and the steep slopes located between Unadilla and Franklin would not be able to withstand another flood when interjected a pipeline into the mix. The flood waters running toward Franklin were horrendous in 2006 and a pipeline located there would certainly be unadvisable to say the least.
- CO30-3 The Draft EIS fails to adequately address this concern. The studies that are attached are very vague to say the least and are incomplete. A more thorough study needs to be done to protect those homes located along the Rte 357 corridor on the way to Franklin Mountain. A full comprehensive impact study needs to be done along the Olecut Creek area as that feeds parts of Otego, NY and Treadwell, NY as well. How much dynamite will be needed? how much dynamite will be used? What will be the limit? What are all of the effects from the various amounts in the different locales, such as Unadilla, and Sidney Center and of course Franklin, as those terrains are very unique and different in their own ways?
- CO30-4 The CCTC expects this document to address the time of day that dynamite will be used and what are the penalties for violating that policy? We have children in and around those areas. We have hikers and hunters and fishermen, but more importantly, we have homes and dwellings along that corridor that cannot

CO30-1

Blasting is discussed in sections 2.3.1 and 4.1.3 of the EIS. Given Constitution's proposed mitigation measures and our recommendations, we conclude that impacts from blasting would be effectively minimized. Blasting would only be used if the underlying rock can't be dislodged with heavy machinery including track hoes with special implements, hammers, and other equipment. If blasting does become necessary, it typically involves a small scale, controlled, rolling detonation procedure resulting in limited ground upheaval. These blasts do not typically result in large, above ground explosions. See the response to comment LA10-13. The exacerbation of flooding due to blasting is not anticipated, although, as now discussed in the EIS, vegetation removal and ground disturbance could influence flooding and erosion.

CO30-2

Constitution and Iroquois would both implement sediment and erosion controls based upon our Plan and Procedures, as well as other proposed measures to reduce or prevent the negative effects of stormwater runoff. Blasting would not be expected to increase erosion. See the response to comment CO1-5 regarding flooding.

CO30-3

See the response to comment CO30-1. As stated in section 2.3.1 of the EIS, the minimum charges needed to perform the blasting would be used.

CO30-4

According to Constitution's Blasting Plan, blasting would occur during daylight hours and homeowners would be notified at least 72 hours prior to blasting activities. Charges would be kept to the minimum needed to break up and dislodge the rock.

COMPANIES AND ORGANIZATIONS

CO30 – Concerned Citizens of Trout Creek (cont’d)

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CO30-4
cont'd | withstand another 100 year flood with the added erosion and runoff from a major
pipeline project added to it.

CO30-5 | Please address these issues in proper studies and attachments and give the local
residents enough time to both study the document and then comment on said
document.

| Thank you in advance for your expected cooperation,

Howard L Hannum, Co-Founder
Concerned Citizens of Trout Creek

CO30-5 See the response to FA1-1 regarding extension of the comment
period.

COMPANIES AND ORGANIZATIONS

CO31 – Allegheny Defense Project

This has been filed
twice by the same
organization.

UNITED STATES OF AMERICA
BEFORE THE
FEDERAL ENERGY REGULATORY COMMISSION

In the Matter of
Constitution Pipeline Company, LLC
Constitution Pipeline Project

)
)
)

Docket No. CP13-499-000

CO31-1

MOTION FOR LEAVE TO INTERVENE

Pursuant to Rules 212 and 214 of the Federal Energy Regulatory Commission's ("FERC") Rules of Practice and Procedure, 18 C.F.R. §§ 385.212 and 385.214, and 18 C.F.R. § 157.10, the Allegheny Defense Project respectfully requests leave to intervene in the above-captioned proceeding. On June 26, 2013, FERC published a notice of application under Section 7(c) of the Natural Gas Act and Part 157 of its regulations for Constitution Pipeline Company's (CPC) Constitution Pipeline Project (Project). CPC also requests blanket authorizations under Part 157, Subpart F and Part 284, Subpart G, of FERC's regulations. In support of this Motion to Intervene, Allegheny Defense Project states as follows:

I. COMMUNICATIONS AND SERVICE

All communications, pleadings, and orders with respect to this proceeding should be sent to:

Ryan D. Talbott
5020 NE 8th Avenue
Portland, OR 97211
Tel: (503) 887-7845
rtalbott@alleghenydefense.org

CO31-1

The commentor's motion to intervene and statement regarding the proposed projects is noted.

S-334

COMPANIES AND ORGANIZATIONS

CO31 – Allegheny Defense Project (cont'd)

This has been filed twice by the same organization.

CO31-1
cont'd

II. FERC’S REGULATIONS PROVIDE THAT A MOTION TO INTERVENE WITHIN THE COMMENT PERIOD OF A DRAFT ENVIRONMENTAL IMPACT STATEMENT IS TIMELY.

FERC’s regulations implementing NEPA provide that “any person who files a motion to intervene on the basis of a [DEIS] will be deemed to have filed a timely motion, in accordance with §385.214, as long as the motion is filed within the comment period for the [DEIS].” 18 C.F.R. § 380.10(a)(1)(i). *See also* 18 C.F.R. § 157.10(a)(2). This motion to intervene is being filed on April 5, 2014, two days before the expiration of the comment period on the DEIS. Therefore, this is a timely motion to intervene in this proceeding.

III. INTERESTS OF PETITIONER

Allegheny Defense Project is a grassroots conservation organization headquartered at 117 West Wood Lane, Kane, PA 16735 and is dedicated to the protection and restoration of the Allegheny Bioregion. Formed in 1994, our organization works to protect the Allegheny National Forest and other public lands from the impacts of industrial extraction such as oil and gas drilling. Pursuant to 18 C.F.R. § 285.214(b)(1) and 18 C.F.R. § 285.214(b)(2)(ii), Allegheny Defense Project does not support the Project and does not believe it is in the public interest.

The rapid increase of shale gas drilling in Pennsylvania is fundamentally altering the Commonwealth’s landscape with new roads, well sites, wastewater disposal pits, pipelines, and other infrastructure. The U.S. Geological Survey recently published numerous reports detailing how shale gas drilling activities, including pipeline construction, are rapidly fragmenting wildlife habitat throughout Pennsylvania’s forestlands. The Pennsylvania Supreme Court recently stated in a decision that:

By any responsible account, the exploitation of the Marcellus Shale Formation will produce a detrimental effect on the environment, on the people, their children, and future generations, and potentially on the public purse, perhaps rivaling the environmental effects of coal extraction.

COMPANIES AND ORGANIZATIONS

CO31 – Allegheny Defense Project (cont'd)

S-336

This has been filed twice by the same organization.

CO31-2 *Robinson Township v. Commonwealth of Pennsylvania*, J-127A-D-2012, 119 (2013).

Allegheny Defense Project is concerned that FERC is approving projects such as the underlying project without adequately considering the direct, indirect, and cumulative impacts on a regional level. FERC must halt all projects in the Marcellus Shale region that would facilitate the extraction and/or transportation of shale gas until it complies with the National Environmental Policy Act (NEPA) and prepares a programmatic regional EIS on the direct, indirect, and cumulative effects of such activities on the region as a whole. FERC's approval of the underlying project will encourage further shale gas drilling in Pennsylvania and, as a result, further degradation of Pennsylvania's forests and wildlife habitat, water, air, and recreation opportunities. Such actions will directly, indirectly, and cumulatively impact the public resources that our organization works to protect. Therefore, Allegheny Defense Project's participation in this proceeding is in the public interest.

IV. CONCLUSION

WHEREFORE, the Allegheny Defense Project respectfully requests that it be permitted to intervene in this proceeding with full rights to participate in all further proceedings.

Dated: April 5, 2014

Respectfully submitted,

/s/ Ryan Talbott
Ryan Talbott
Executive Director
Allegheny Defense Project
117 West Wood Lane
Kane, PA 16735
rtalbott@alleghenydefense.org

CO31-2 See the response to comment response LA1-4. The FERC is an independent regulatory agency with specific jurisdiction defined by law that does not permit the Commission to direct the development of interstate natural gas proposals on a regional or nationwide scale. The Commission is tasked, however, with reviewing individual interstate natural gas transmission projects when an established market demand drives a proposal. Given the parameters defining the bounds of the FERC, we have determined that it is neither a prudent use of agency resources, nor within our authority, to conduct a "programmatic EIS" discussing all natural gas development, transmission, and consumption on a regional, or nationwide basis. Furthermore due to the widely varying nature and scope of natural gas projects, we prepare focused environmental analysis for specific proposals, not a generic analysis to be used on all projects.

COMPANIES AND ORGANIZATIONS

CO31 – Allegheny Defense Project (cont’d)

This has been filed twice by the same organization.

CO31-2
cont'd

CERTIFICATE OF SERVICE

Pursuant to Rule 2010 of FERC’s Rules of Practice and Procedure, 18 C.F.R. § 385.2010,
I, Ryan Talbott, hereby certify that I have this day served the foregoing document upon each
person designated on this official list compiled by the Secretary in this proceeding.

Dated: April 5, 2014

Respectfully submitted,

/s/ Ryan Talbott
Ryan Talbott
Executive Director
Allegheny Defense Project
117 West Wood Lane
Kane, PA 16735
rtalbott@alleghenydefense.org

S-337

COMPANIES AND ORGANIZATIONS

CO32 – Center for Sustainable Rural Communities

Center for Sustainable Rural Communities
PO Box 532
Richmondville, New York 12149

April 6, 2014

Ms. Kimberly D. Bose
Secretary
Federal Energy Regulatory Commission
888 First Street, NE
Washington, D.C. 20426

Us Army Corps of Engineers
New York District CENAN-OP-R
Upstate Regulatory Field Office
1 Buffington Street, Bldg. 10, 3rd Floor
Watervliet, New York 12189-4000

CO32-1 RE: Docket Nos. CP13-499 and CP13-502, NAN-2012-00449-UBR

The failure of the DEIS to include a comprehensive evaluation of solar energy alternatives to the proposed Constitution Pipeline.

The Center for Sustainable Rural Communities (CSRC) is a 501 (C)3 non-profit New York Corporation that advocates for vibrant, livable and sustainable rural communities in Upstate, New York. The CSRC encourages environmentally-compatible economic development, access to arts and technology and progressive community and land-use planning, while working to preserve the rural character and ecological and cultural diversity of the region.

The CSRC acknowledges the assistance of community volunteer and researcher Glenn Sanders in the preparation of this comment which addresses the FERC's evaluation of the photovoltaic (solar power) alternative to increased natural gas supplies delivered by the Constitution project in the Draft Environmental Impact Statement (DEIS)¹.

The viability of a solar power alternative was dismissed by the FERC in the DEIS claiming it would have higher costs, greater environmental impacts, potential reliability issues, inadequate insolation, and lower efficiencies.

¹ DEIS, page 3-11.

CO32-1

Section 3.1.2.3 of the EIS has been updated to acknowledge the commentor's statements regarding solar energy alternatives. The information included in the EIS was intended to serve as a generalized discussion of how an alternative energy source such as solar power might compare to the proposed projects. The FERC staff reviews applications for interstate natural gas pipeline projects in accordance with an applicant's stated objective(s) in order to disclose the environmental impacts of a proposal to inform the decision makers and, in accordance with NEPA, evaluate reasonable alternatives to a project. However, the FERC as a matter of policy and in accordance with the Natural Gas Act and other governing regulations, does not direct the development of the natural gas (or other energy types) industry's infrastructure regionally or on a project-by-project basis, nor does it have the authority to permit or approval solar energy projects. As such, the FERC staff's evaluation of reasonable alternatives does not include setting project objectives, determining what an applicant's objective "should" be, nor does it include redefining the objectives of a Project.

COMPANIES AND ORGANIZATIONS

CO32 – Center for Sustainable Rural Communities (cont'd)

CO32-1
cont'd

The only documentation provided for these alleged shortcomings was the *2009 NYS Energy Plan Report*² which contained just one claim of higher costs. The DEIS ignores a preponderance of published data indicating a significant drop in solar installation costs since the 2009 report was written³ and forecasts of additional reductions in costs expected over the next three years⁴.

The California Public Utilities Commission has stated that "residential solar system costs have decreased by 28 percent since 2007⁵." The Solar Energy Industries Association reported in their 2013 Year in Review Report that "[t]he average price of a solar panel has declined by 60% since the beginning of 2011⁶."

The DEIS also omitted consideration of a widely-publicized and relevant January 1, 2013 report⁷ by Administrative Law Judge Eric Lipman, an appointee of the Minnesota Public Utilities Commission, in which Judge Lipman concluded that large-scale new energy needs were better satisfied by solar than by natural gas proposals. The solar proposal was found to entail lower environmental (natural capital) costs and lower overall costs for utility ratepayers. Notably, Judge Lipman's assessment was based on a professionally prepared solar proposal involving a large number of small-scale, widely distributed installations, which could be sited without need for new transmission lines, and with minimal visual, habitat, and vegetation impacts. In contrast, the FERC evaluation assumes "a large, industrial-scale, solar power generation facility," that is, a single, remotely sited, high-impact power plant. No basis is provided for this assumption.

It is also important to emphasize that the solar insolation levels at the sites in the 2014 Minnesota Report were no higher than those throughout the Constitution project region and its targeted customer regions. Finally, no significant problems with reliability or efficiency could be found in the Minnesota solar proposal. Lacking documentation of its assumptions and claims, and without solicitation of input from reputable, capable solar developers, the FERC's solar alternative evaluation is arbitrary and capricious, and antithetical to the FERC's imperative to comply with

² <http://energyplan.ny.gov/Plans/2009.aspx>

³ <http://www.nrel.gov/docs/fy13osti/56776.pdf> and
<http://www.forbes.com/sites/justingerdes/2012/05/24/solar-power-more-competitive-than-decision-makers-or-consumers-realize>.

⁴ <http://thinkprogress.org/climate/2013/06/23/2183291/forecast-cost-of-pv-panels-to-drop-to-036-per-watt-by-2017/>

⁵ <http://www.cpuc.ca.gov/PUC/energy/Solar/2012CASolarLegReport.htm>

⁶ <http://www.seia.org/research-resources/solar-industry-data>

⁷ <http://wjon.com/judge-ruling-could-mean-more-solar-power-in-minnesota/>
<http://thinkprogress.org/climate/2014/01/01/3109691/judge-says-solar-better-deal-minnesota>
<http://www.law360.com/articles/498244/solar-power-wins-alj-s-favor-to-meet-utility-shortfalls>

COMPANIES AND ORGANIZATIONS

CO32 – Center for Sustainable Rural Communities (cont’d)

CO32-1
cont'd

NEPA's requirement that the agency address alternatives to a proposed action. We therefore submit that the FERC failed to take a "hard look" at alternatives to the proposed project and respectfully request that the FERC issue a revised DEIS that includes a comprehensive, scientifically accurate and current, peer reviewed evaluation of solar energy alternatives to the proposed Constitution Pipeline.

Respectfully Submitted,

Robert Nied
Member- Board of Directors
Center for Sustainable Rural Communities

COMPANIES AND ORGANIZATIONS

CO33 – Business Council of NY State



DARREN SUAREZ
Director of Government Affairs

April 4, 2014

Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
888 First Street, NE
Washington, DC 20426

RE: Constitution Pipeline Company, LLC – FERC Docket No. CP13-499

CO33-1 Dear Ms. Bose,

On behalf of The Business Council of New York State, I am writing to express our continued support for the Constitution Pipeline Company, LLC project ("Constitution" or "Project") and request that the Commission act swiftly to make certain that this critical Project is in service in 2015. The Business Council's membership strongly supports efforts to provide affordable and stable energy costs. Affordable energy is a critical component to any thriving economy, and a necessity for New York businesses and residents alike, particularly to the energy intensive manufacturing sector.

The harsh winter we just experienced in New York State once again reminds us of how critical it is to have a robust energy supply infrastructure that meets the needs of all New York residents. Besides ensuring adequate supplies, modern energy infrastructure is critical in providing supplies at the most reasonable and fair price. When infrastructure cannot meet current needs, especially in time of extreme cold or hot weather, residential and commercial users feel the economic squeeze.

With this in mind, I want to reaffirm The Business Council's support for the pending Project, which will bring supplies of natural gas from Pennsylvania to New York. The 124-mile long pipeline would connect Pennsylvania gas fields to two important interstate natural gas lines, Iroquois Gas Transmission and Tennessee Gas Pipeline systems, respectively, in the Town of Wright, Schoharie County. The Iroquois line is critical in meeting gas capacity needs in New York City and Long Island, while the Tennessee line runs east to New England.

Working to create economic growth, good jobs and strong
communities across New York State



The Business Council of New York State, Inc. | 152 Washington Avenue | Albany, New York 12210-2289 | www.bcnys.org | T 518.465.7511

CO33-1

The commentator's statements in support of the proposed projects are noted.

COMPANIES AND ORGANIZATIONS

CO33 – Business Council of NY State (cont'd)

CO33-1
cont'd

Constrained natural gas transmission, combined with increased demand, has resulted in a New York natural gas spot market price in January that exceeded \$120 per thousand cubic feet. At that time, the same gas was selling for approximately \$5 per thousand cubic feet in Pennsylvania.

The Project will also assist New York in meeting its clean energy goals as enunciated in the New York State Draft Energy Plan. In fact, the recently drafted 2014 New York State Energy Plan proposes to assist with the replacement of heating oil with natural gas. Additionally, initiatives 8 and 9 in the draft State Energy Plan specifically address the need for additional natural gas infrastructure. Natural gas currently provides over 54% of the energy used in residential heating in the state, a figure that is sure to grow in the near future.¹ Moreover, natural gas represents over 34% of total energy use in the state for both residential and commercial purposes.²

It is expected that the new pipeline can go into service in late 2015, so long as necessary regulatory approvals are secured. The Commission staff recently issued a draft Environmental Impact Statement for the project, which concluded that the construction and operation of the pipeline would result in limited adverse environmental impacts. FERC staff has also outlined additional mitigation measures that Constitution could take to minimize or avoid potential impacts on major areas of concern including water bodies, wetlands and wildlife. Conclusively, the record in these proceedings demonstrates that the Project is in the public convenience and necessity and warrants the Commission's approval.

For the reasons mentioned above, The Business Council strongly urges the Commission to issue the necessary regulatory approval to ensure construction may proceed in a timely manner.

Sincerely,

Darren Suarez
Director of Government Affairs
Intervenor

¹ NYS Draft Energy Plan, 2014, Table 7, p. 17.

² *Id.*, p.18.

April 4, 2014

COMPANIES AND ORGANIZATIONS

CO34 – The Christensen Family Trust

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CAROL C. VOYAGES

April 6, 2014

FEDERAL ENERGY REGULATORY COMMISSION
Washington, D.C. 20426

OEP/DG2E/Gas 4
Constitution Pipeline Company, LLC
Constitution Pipeline Project
Iroquois Gas Transmission System, L.P.
Wright Interconnect Project
Docket Nos. CP13-499-000
CP13-502-000

Re: Comment as Landowner re Proposed Route

CO34-1

Please be advised that the undersigned, beneficiaries under The Christensen Family Trust, owner of two tracks of land in Broome County, through which Constitution Pipeline Company, LLC intends to construct its pipeline wish to comment on the route proposed by the Company. As a point of reference, our property lies on the border of the Commonwealth of Pennsylvania a short distance from where the pipeline enters New York State. The proposed route angles across both tracks of land for a total length of 3,431.99 linear feet (see Exhibit A and A-1).

It is important to note that these tracks of land are already bisected by a pipeline constructed by Bluestone Gas Corp. of NY, Inc. which runs for a total length of 4,076 linear feet (See Exhibit B) across the property. Constitution's pipeline will cross that of Bluestone while crossing our property.

We have repeatedly requested that Constitution work with us to adjust the route so as to mitigate the damage to this property as the pipeline cuts across our ridge and angles down the mountain. We have specifically requested that the route be adjusted to increase the distance from the sole residence on the property; currently located within 100 feet.

With the extensive amount of property the pipeline company intends to take from us, we are asking the Commission to allow us the opportunity to mitigate some of the damages the pipeline will inflict on us by directing Constitution Pipeline to meet with us with an attitude of compromise and conciliation rather than the entrenched attitude they have heretofore exhibited.

Respectfully submitted,

Maureen Deis, Co-Trustee and Beneficiary, The Christensen Family Trust, u/t/d 3/21/94
Arleen Strider, Co-Trustee and Beneficiary,
Mary Ann Barry, Beneficiary
Carol Voyages, Beneficiary

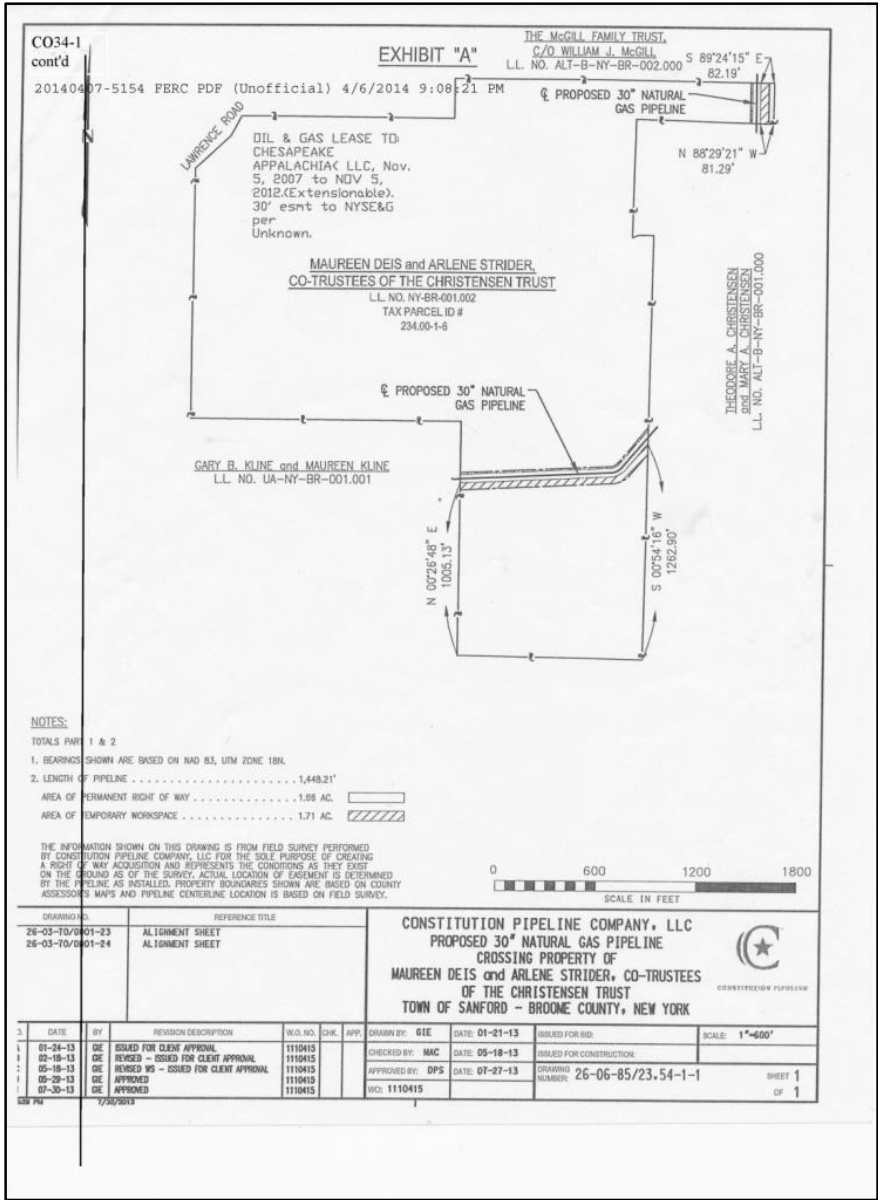
CO34-1

Section 3.4.3 of the EIS has been updated to include an assessment of minor route variations for parcels NY-BR-001.002 and ALT-B-NY-BR-001.000.

COMPANIES AND ORGANIZATIONS

CO34 – The Christensen Family Trust (cont'd)

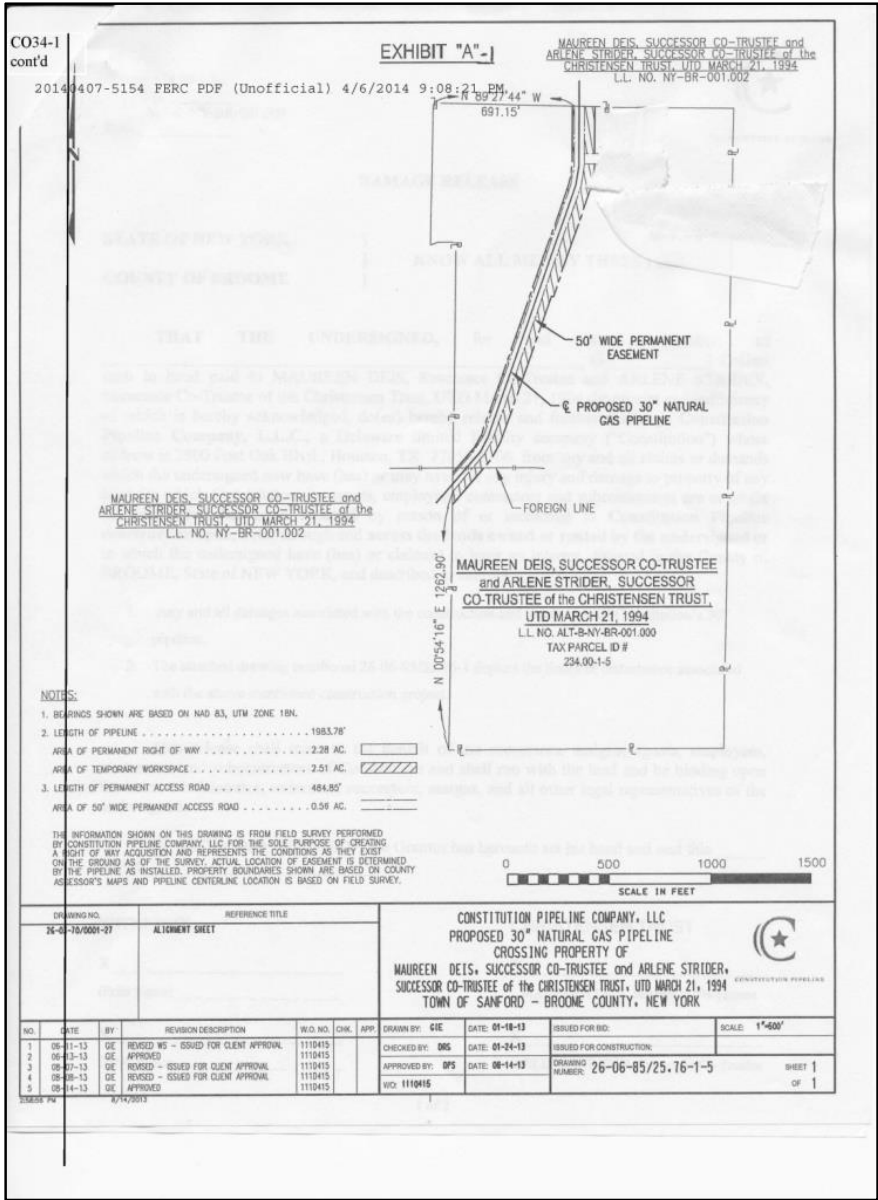
S-344



COMPANIES AND ORGANIZATIONS

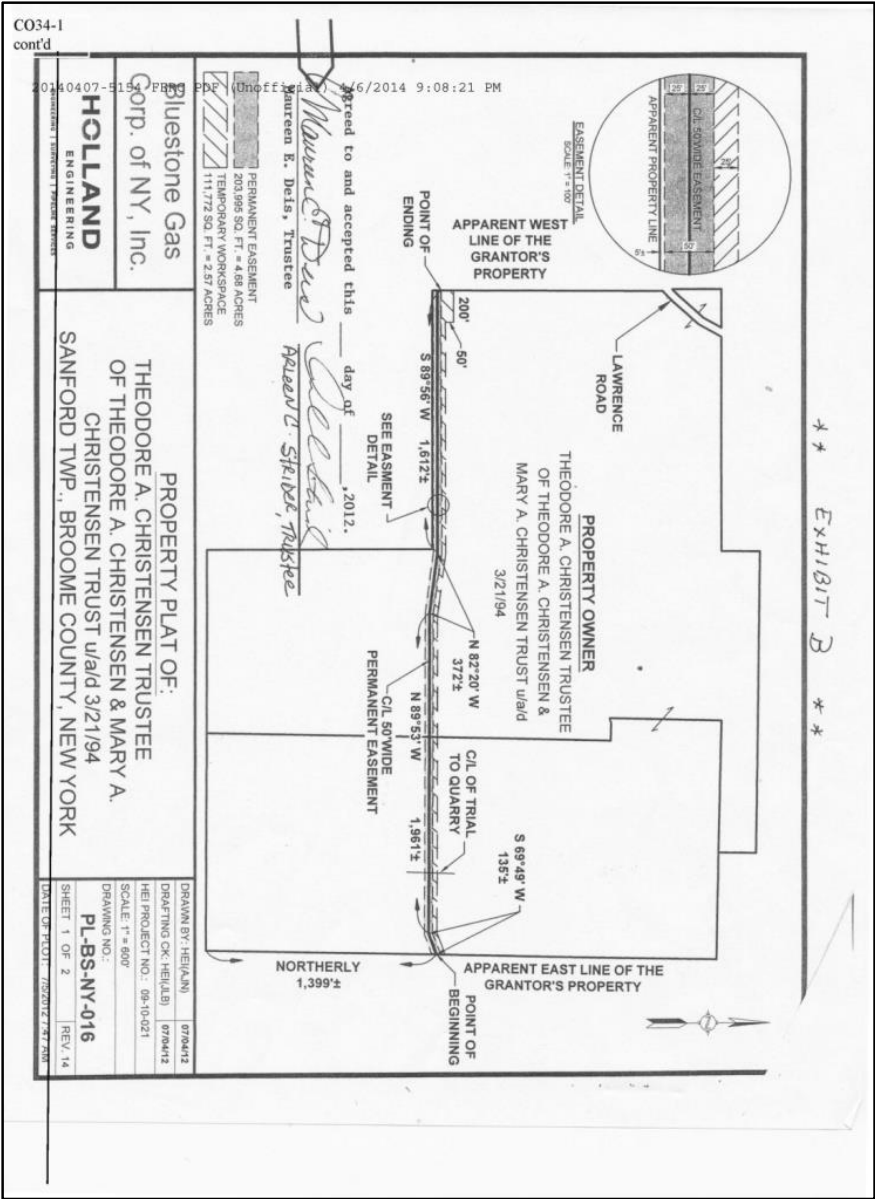
CO34 – The Christensen Family Trust (cont'd)

S-345



COMPANIES AND ORGANIZATIONS

CO34 – The Christensen Family Trust (cont'd)



COMPANIES AND ORGANIZATIONS

CO35 – Chesapeake Bay Foundation



CHESAPEAKE BAY FOUNDATION
Saving a National Treasure

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April 7, 2014

US Army Corps of Engineers
New York District, CENAN-OP-R
Upstate Regulatory Field Office
1 Buffington Street, Bldg. 10, 3rd Floor
Watervliet, New York 12189-4000

Re: Public Notice Number NAN-2012-00449-UBR

CO35 To whom it may concern:

On behalf of the Chesapeake Bay Foundation, Inc. ("CBF") and over 200,000 of our members, please accept the following comments regarding the Constitution Pipeline Company, LLC application NAN-2012-00449-UBR.

CBF is a 501(c) (3) organization with its headquarters in Annapolis, Maryland and offices in Harrisburg, Pennsylvania; Richmond, Virginia; Norfolk, Virginia; Easton, Maryland, and the District of Columbia. CBF is the largest conservation organization dedicated solely to protecting the Chesapeake Bay watershed, the Chesapeake Bay itself, and its tributaries.

Since 2010, CBF has worked tirelessly to support the implementation of the Chesapeake Bay Clean Water Blueprint. The Blueprint consists of pollution limits for nitrogen, phosphorus and sediment established in the Bay Total Maximum Daily Load ("TMDL"), and the corresponding state-based Watershed Implementation Plans, that detail pollution reduction activities across the 64,000 square mile Chesapeake Bay watershed to achieve these limits. . Roughly two-thirds of the Commonwealth of Pennsylvania, and a large percentage of the southern tier of New York, drain to the Chesapeake Bay. The proposed 124-mile Constitution Pipeline lies almost entirely within the Chesapeake Bay watershed.

PHILIP MERRILL ENVIRONMENTAL CENTER | 6 HERNDON AVENUE | ANNAPOLIS, MD 21403
410/268-8816 | FAX: 410/268-6687 | CBF.ORG

CO35-1

See the response to comments response LA1-4, LA1-5, and CO1-4.

COMPANIES AND ORGANIZATIONS

CO35 – Chesapeake Bay Foundation (cont'd)

US Army Corps of Engineers
New York District, CENAN-OP-R
Upstate Regulatory Field Office
1 Buffington Street, Bldg. 10, 3rd Floor
Watervliet, New York 12189-4000
Page 2

CO35
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A variety of large-scale environmental impacts are associated with unconventional natural gas development have been discussed the impacts on the quality of rivers and streams.^{1,2,3,4} Many of these impacts, cumulatively, may pose risks to the health of the Chesapeake Bay itself. A 2010 study by The Nature Conservancy (“TNC”)⁵, for example, indicates between 48,000 and 120,000 acres of forest are estimated to be cleared in the Susquehanna River basin during the next two decades to make way for well pads, access roads, pipelines, and compressor stations. Before unconventional natural gas development started, 83 percent of watersheds in the Marcellus Shale region were classified as “sensitive” meaning they had less than 10 percent watershed impervious cover. A 2014 study by TNC estimates this percentage will decline to 65 percent due to land conversion associated with unconventional shale gas development if full build-out occurs.⁶ The TNC study also determined the percent of watersheds classified as “impacted” or “non-supporting” will increase significantly as a result. In addition, various water quality impacts and air pollution from trucks, wells, compressor stations and pipelines have been widely documented in areas with active shale oil and gas development around the country, including the shale development in the Susquehanna River basin.

According to the application (Public Notice Number NAN-2012-00449-UBR), the project would establish stream crossings at 359 separate locations, totaling 3,760 linear feet of “temporary” impacts and 40 linear feet of permanent impacts for access road construction. The pipeline application also indicates that 1,709 wetlands will be impacted, totaling 121.92 acres of “temporary” impacts and 25.09 acres of permanent impacts. The project is also estimated to disturb over 657 acres of forest land.

¹ Kargro, DM, RG Wilhelm, DI Campbell. (2010). Natural Gas Plays in the Marcellus Shale: Challenges and Potential Opportunities. *Environ. Sci. Technol.* 2010, 44, 5679–5684.

² Anderson, RM, DA Keegar. (2010). Potential for Impairment of Freshwater Mussel Populations in DRBC Special Protection Waters as a Consequence of Natural Gas Exploratory Well Development. <http://delawareestuary.org/STACReports>

³ Mead, J, Frank Anderson, David Velinsky, and Richard Horwitz. (2011). The Marcellus Shale Play: Impacts to stream ecosystems and potential regulation of intensity of mining. http://files.dep.state.pa.us/PublicParticipation/Public%20Participation%20Center/PubPartCenterPortalFiles/Marcellus%20Shale/Impact_of_Gas_Development_on_Surface_Waters_presentation.pdf

⁴ Adams, M. Evaluation of Erosion and Sediment Control and Stormwater Management for Gas Exploration and Extraction Facilities in Pennsylvania under Existing Pennsylvania Regulations and Policies to Determine if Existing Safeguards Protect Water Quality in Special Protection Waters of the Delaware Basin.

⁵ Johnson, N. (2010). Pennsylvania Energy Impacts Assessment Report 1: Marcellus Shale Natural Gas and Wind. The Nature Conservancy and Audubon Pennsylvania. Harrisburg, PA.

⁶ Evans JS, Kiesecker JM. (2014). Shale Gas, Wind and Water: Assessing the Potential Cumulative Impacts of Energy Development on Ecosystem Services within the Marcellus Play. *PLoS ONE* 9(2): e89210. doi:10.1371/journal.pone.0089210.

COMPANIES AND ORGANIZATIONS

CO35 – Chesapeake Bay Foundation (cont'd)

US Army Corps of Engineers
New York District, CENAN-OP-R
Upstate Regulatory Field Office
1 Buffington Street, Bldg. 10, 3rd Floor
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Page 3

CO35
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cont'd

The project location is also an area which supports a number of Pennsylvania's most pristine and ecologically sensitive streams. The Pennsylvania Department of Environmental Protection (PADEP) classifies these streams as high quality ("HQ") and exceptional value ("EV") based on specific water quality criteria. Similarly, streams containing naturally reproducing wild trout populations are foremost indicators of exceptional water quality, and as such are found only in the Commonwealth's most pristine and ecologically sensitive waters. The area proposed for this pipeline project also holds a number of Pennsylvania's designated Class A Wild Trout Streams. Ninety-seven of the water bodies crossed in the project location support trout populations.

In addition, the project area is located where there are erodible, steep slopes and farmland. Disturbance of forested mountain sides and certain agricultural lands during construction, along with the impacts of soil compaction and deforestation post-construction, can reasonably be expected to alter site conditions so as to cause or contribute to increased rill and gully erosion, decreased infiltration of precipitation, increases in peak rate and volume of stormwater discharge, and downstream water quality degradation.

Although the applicants note that in Pennsylvania the permitting of upstream facilities associated with the development of unconventional natural gas is under the jurisdiction of the PADEP and that Best Management Practices (BMPs) for the construction and operation of upstream oil and gas production facilities are regulated by the PADEP, such regulation is not designed to achieve a no-net increase in pollutant loads. Without regulations to ensure that there is not an increase in pollutant loads, increased pollutant loads to local rivers and streams, and ultimately the Bay, may impact the Commonwealth's ability to meet the requirements of the Bay Clean Water Blueprint. The PADEP laws and regulations also do not address the potential cumulative impacts associated with increased activities associated with the exploration and development of unconventional natural gas.

Given the diversity and magnitude of the potential impacts of the proposed Constitution Pipeline, the projected intensification of unconventional natural gas extraction activities within the Bay watershed, along with the recognition that state permitting requirements do not fully mitigate environmental impacts, the Chesapeake Bay Foundation reissues our request for a Programmatic Environmental Impact Statement ("PEIS") on unconventional natural gas extraction in the Marcellus Shale basin and related activities throughout the Chesapeake Bay Watershed. In particular, the potential cumulative impacts of the industry on the ability of the Bay states to achieve and maintain the pollutant load reductions in the Bay TMDL, and associated state Watershed Implementation Plans, must be accounted for.

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COMPANIES AND ORGANIZATIONS

CO35 – Chesapeake Bay Foundation (cont'd)

US Army Corps of Engineers
New York District, CENAN-OP-R
Upstate Regulatory Field Office
1 Buffington Street, Bldg. 10, 3rd Floor
Watervliet, New York 12189-4000
Page 4

CO35
-1
cont'd We originally made this request regarding the Marcellus Shale basin activities in an April 2011 petition to the Council for Environmental Quality ("CEQ") to all federal agencies involved in unconventional natural gas drilling activities, including the Federal Energy Regulatory Commission, in which we call for CEQ to undertake a cumulative impacts analysis to determine the effects that drilling in the Marcellus Shale region has on human health and the environment throughout the Chesapeake Bay states including, but not limited to, impacts to the air, water quality, forest land, national park land, wildlife habitat and ecosystems. Additionally, we petitioned CEQ to issue a PEIS addressing the cumulative impacts and suggesting reasonable alternatives to mitigate negative impacts throughout the Chesapeake Bay states and promulgate any necessary guidance and regulations based upon the findings in the PEIS and to comply with the mandates of Executive Orders 13508, 11514, 11991, and 13352.

CBF's original petition was based upon our concern that there is no federal oversight or analysis of cumulative impacts from the expansive and ever growing drilling, extraction, processing, and transportation that is occurring in the Marcellus Shale region, which consumes large portions of the Chesapeake Bay watershed. Since our petition, we have witnessed an increased level of drilling related activity throughout the watershed, including over 80,000 acres of land leased for drilling in Tidewater Virginia. Additionally, there is more transporting infrastructure such as distribution pipelines and now the proposed Dominion Liquefied Natural Gas export facility at Cove Point in Calvert County, MD. The *direct* impacts to the Chesapeake Bay from one new drill pad, access road or the proposed Constitution Pipeline may be limited to forest impacts at the construction staging area and an increase in impervious cover at the particular project site, however, the *cumulative* impacts associated with unconventional shale drilling and the supporting infrastructure and activities could be detrimental not only to local rivers and streams and Chesapeake Bay water quality throughout a much larger area.

Given that the Constitution Pipeline proposal, and it's projected impacts, is representative of an anticipated dramatic increase in unconventional natural gas extraction related development, the totality of the unconventional natural gas extraction and related industries' potential impacts to an already impaired Chesapeake Bay Watershed, and the number of questions outlined in our April 2011 petition that remain unanswered, CBF is again calling for a PEIS addressing the cumulative impacts of drilling in the Marcellus and Taylorsville Shale formations. The scope of the PEIS should include the cumulative impacts to air and water quality throughout the Chesapeake Bay watershed from unconventional natural gas extraction itself, along with all associated activities such as compressor stations, gathering and delivery pipelines, and transportation. This request is consistent with an EPA letter to the Federal Energy Regulatory Commission requesting an environmental review of the potential increase in unconventional natural gas extraction throughout the watershed and any potential changes in greenhouse gas emissions as a result of market shifts.

S-350

COMPANIES AND ORGANIZATIONS

CO35 – Chesapeake Bay Foundation (cont'd)

US Army Corps of Engineers
New York District, CENAN-OP-R
Upstate Regulatory Field Office
1 Buffington Street, Bldg. 10, 3rd Floor
Watervliet, New York 12189-4000
Page 5

CO35
-1
cont'd We further request that FERC fully consider the findings of such a PEIS with respect to all pending and future unconventional natural gas extraction related permits within the Chesapeake Bay Watershed that are within FERC's jurisdiction.

CO35
-2 In addition, we object to the pipeline based upon FERC's Environmental Impact Statement concluding that the project would result in adverse environmental impacts. We disagree with the conclusion that these impacts would be reduced to less-than-significant levels.⁷

We would be happy to meet to discuss our petition for a PEIS, the scope of a cumulative impacts review related to unconventional natural gas extraction in the Chesapeake Bay region, and our concerns regarding the water quality impacts of the proposed Constitution Pipeline.

Sincerely,



Kim Coble
Vice President Environmental Protection and Restoration

⁷ DEIS on Constitution Pipeline Project and Wright Interconnect Project (Docket Nos. CP13-499-000 and CP13-502-000). Issued February 12, 2014. <https://www.ferc.gov/industries/gas/enviro/eis/2014/02-12-14-eis.asp>

CO35-2

The commentor's statement regarding the draft EIS is noted.

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COMPANIES AND ORGANIZATIONS

CO36 – Center for Sustainable Rural Communities

Center for Sustainable Rural Communities
PO Box 532
Richmondville, New York 12149

April 7, 2014

Ms. Kimberly D. Bose
Secretary
Federal Energy Regulatory Commission
888 First Street, NE
Washington, D.C. 20426

Us Army Corps of Engineers
New York District CENAN-OP-R
Upstate Regulatory Field Office
1 Buffington Street, Bldg. 10, 3rd Floor
Watervliet, new York 12189-4000

RE: Docket Nos. CP13-499 and CP13-502, NAN-2012-00449-UBR

This is a corrected re-submittal of
comments from CSRC. This
supersedes the original comment
submitted on 4-7-14. This was
submitted twice on 4-8-14.

CO36
-1
Comment on conflicts of interest that diminish the integrity of the regulatory process and prevent a “hard
look” at potential impacts on eco-systems and communities.

The Center for Sustainable Rural Communities, an Intervener in the matter of the proposed Constitution
Pipeline, submits the following:

- The proposed Contractor Yard along Route 7 in the Town of Richmondville is subject to review and approval by the Town of Richmondville Planning Board. The Chairman and a voting member of that Board is **Harold J. Loder, Sr.**
- The proposed Telecommunications Tower in the Town of Richmondville is subject to review and approval by the Town of Richmondville Planning Board. The Chairman and a voting member of that Board is **Harold J. Loder, Sr.**
- The proposed expansion of the Iroquois Compressor Station is subject to the review and approval of the Schoharie County Planning Commission. **Harold J. Loder, Sr.** is a voting member of that body.
- Information to inform both Constitution’s Resource Reports and the FERC’s DEIS about step slopes, wetlands and other significant features in the Town of Richmondville was provided to Constitution by **Harold J. Loder, Sr.**, the Town’s identified point of contact.

On 12/27/13 Mr. Loder’s family members received nearly \$60,000 in easements payments from Constitution Pipeline¹, yet he has not recused himself from official discussions or deliberations related to the Constitution Pipeline project, has not requested that Constitution and the Town of Richmondville agree on an alternate point of contact, has not disclosed to the Town or the County his familial financial gain from Constitution nor has he taken actions to remedy the appearance of impropriety.

¹ Information obtained by the examination of deeds registered with the office of the Schoharie County Clerk.

CO36-1

The commentor’s statements regarding the Town of Richmondville are noted.

S-352

COMPANIES AND ORGANIZATIONS

CO36 – Center for Sustainable Rural Communities (cont'd)

This is a corrected re-submittal of comments from CSRC. This supersedes the original comment submitted on 4-7-14

CO36
-1
cont'd Town of Richmondville Planning Board minutes examined by the Center for Sustainable Rural Communities contained misstatements by Mr. Loder and misdirection to the Planning Board regarding local zoning, particularly dealing with the process for approving a temporary use permit for the proposed Contractor Yard, indicating a predisposition and possible bias towards approval of the yard.

While the CSRC is not alleging or suggesting a quid pro quo as it relates to Mr. Loder's official actions and payments by Constitution to his family, we do assert that, at the very least, an appearance of impropriety clearly exists and warrants further investigation to ensure that a relationship between those payments and Mr. Loder's official actions does not exist.

On August 14, 2014 the attorney for the Center for Sustainable Rural Communities sent a letter to the Town of Richmondville (See **Attachment I**) informing them of the conflicts detailed in this document. The Town of Richmondville took no action to address those conflicts.

While we understand that the FERC has no jurisdiction over local issues, the commission does have a responsibility to ensure that the whole of the regulatory and approval process for the proposed Constitution Pipeline is not corrupted or influenced by factors that may compromise one or more of the mechanisms designed to identify and mitigate impacts on eco-systems and communities. We believe that the possibility exists that such a compromise has occurred and that a "hard look" at potential impacts of the pipeline and its infrastructure will not occur in the Town of Richmondville until such time as the aforementioned conflicts of interests are addressed and removed from the process.

We therefore respectfully request that the FERC reevaluate the information provided to Constitution by the Town of Richmondville to determine if that information has been accurately and completely furnished and if any shortcoming or inaccuracies in that information have inadvertently or deliberately effected the accuracy and reliability of Constitution's Resource Reports and the FERC's DEIS.

We also request that the FERC contact The Richmondville Town Board and determine what steps are being taken to ensure that local approvals for the proposed Contractor Yard and Communications Tower and County approval for the proposed compressor station expansion are conducted without the influence of conflicts of interest or the appearance of impropriety on the part of the public officials involved.

COMPANIES AND ORGANIZATIONS

CO36 – Center for Sustainable Rural Communities (cont’d)

CO36-2

In light of conflicts of interest and the potential that these conflicts have diminished the integrity of the regulatory and approval process, we also respectfully request that the FERC extend the comment period for at least sixty (60) days to ensure that the matters identified in this document have been adequately addressed and the public has had an opportunity to comment in response to any adjustments made.

Thank you.

Robert Nied
Member – Board of Directors
Center for Sustainable Rural Communities

cc: Marvin Parshall, Jr., Esq.
cc: Douglas H. Zamelis, Esq.

This is a corrected re-submittal of comments from CSRC. This supersedes the original comment submitted on 4-7-14

CO36-2

See the response to comment FA1-1 regarding an extension of the comment period.

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COMPANIES AND ORGANIZATIONS

CO36 – Center for Sustainable Rural Communities (cont'd)

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CO36-2
cont'd



August 14, 2013

Hon. Richard T. Lape, Supervisor
& Members of the Town Board
Town of Richmondville
P.O. Box 555
Richmondville, New York 12149

Re: Conflict of Interest of Harold Loder, Chair, Town of Richmondville Planning Board

Dear Supervisor Lape and Members of the Town Board:

This office represents the Center for Sustainable Rural Communities, Inc. ("CSRC"), a not for profit corporation approved under Section 501(c)(3) of the Internal Revenue Code, organized to encourage sustainable rural communities. As part of that mission, CSRC has been actively engaged in education and outreach with area citizens, including residents of the Town of Richmondville, in connection with the proposed Constitution pipeline project which, if approved and constructed, would significantly impact the environment, economic health, and adversely affect the quality of life for residents throughout the region. This correspondence is submitted in regard to the actual conflict of interest of Town of Richmondville Planning Board chair Harold Loder, and requests that proceedings be commenced in accordance with the Town of Richmondville Code of Ethics and the Town Law.

As you know, the Town of Richmondville Code of Ethics (the "Town Ethics Code"), adopted as Resolution No. 24 of 1991, provides at Section III(A) that "It is the policy of the Town Board of the Town of Richmondville that all officers and employees must avoid conflicts or potential conflicts of interest" which exist "whenever an officer, employee or their relative . . . has an interest, direct or indirect, which conflicts with their duty to the town or which could adversely affect an individual's judgment in the discharge of his or her responsibilities." The Town Ethics Code further provides that "No officer, employee or their relatives shall", among other prohibited activities, "Take action on a matter before the Town or instrumentality thereof when, to his or her knowledge, the performance of that action would provide a pecuniary or material benefit to himself or herself."

Section IV(1) of the Town Ethics Code further requires that "Any officer or their relative who has, will have or intends to acquire a direct or indirect interest in any matter being considered by the Town Board . . . [or] by any other . . . Board . . . and who participates in the discussion before . . . any Board . . . shall publicly disclose on the official record the nature and extent of the interest. Section IV(2) of the Town Ethic Code further provides that "Any officer or employee of the Town of Richmondville or their relative, who has any knowledge of any matter being considered by any Board . . . of the Town of Richmondville in which he or she has, or will have or intends to acquire any direct or indirect interest,

1
8363 Vassar Drive • Manlius, New York 13104 •
• 315.682.0724 • dzamelis@windstream.net •

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COMPANIES AND ORGANIZATIONS

CO36 – Center for Sustainable Rural Communities (cont'd)

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CO36-2
cont'd

shall immediately disclose, in writing, his or her interest to such Board . . . and the nature and the extent thereof, to the degree that such disclosure gives substantial notice of any potential conflict of interest."

Section VII of the Town Ethics Code provides that "In addition to any penalty contained in any other provision of law, any person who shall knowingly and intentionally violate any of the provisions of [the Town Ethics Code] may be fined, suspended or removed from office . . . in the manner provided by law."

Harold Loder, according to public records, is the owner of record of real property along the route of the proposed Constitution pipeline project. Upon information and belief, Harold Loder has already received or will soon be receiving an offer from the sponsor of the proposed Constitution pipeline to convey certain interests in his real property in connection with the proposed pipeline project. According to public records, Harold Loder's immediate family members are also owners of record of real property along the route of the proposed pipeline project, and upon information and belief, have likewise received or soon will be receiving offers in exchange for certain interests in their real properties in connection with the proposed pipeline project.

Additionally, the Richmondville Planning Board (the "Planning Board") will play a significant role in the review of the proposed pipeline project by providing the project sponsor with data and information concerning, among other things, the locations of wetlands, cultural and historic sites, and other pertinent information that may influence the siting of the proposed pipeline project and supporting infrastructure. The Planning Board will also have review and approval authority over certain ancillary aspects of the proposed pipeline project, including staging areas. Accordingly, the Planning Board, its chair, and each of its members must avoid prohibited conflicts of interest, any appearance of impropriety, and must act in compliance with the Town of Ethics Code, and the like provisions of the General Municipal Law.

CSRC submits that as chair of the Planning Board, Harold Loder has a clear and obvious actual conflict of interest in all matters related to the proposed Constitution pipeline project pursuant to Section III(A) of the Town Ethics Code by virtue of his and his relatives' real property and contractual interests, which conflict with his duty to the Town of Richmondville, and which could adversely affect his judgment in the discharge of his responsibilities. Because the proposed Constitution pipeline project would provide a direct pecuniary and material benefit to Harold Loder, he is prohibited from taking any action on any matter involving the proposed Constitution pipeline project by Section III(A)(5) of the Town Ethics Code.

Upon information and belief, and according to official records of the Town of Richmondville, Harold Loder has not publicly disclosed on the official record the existence of his and his relatives' interests in the proposed Constitution pipeline project, or the nature and extent thereof as required by Section IV of the Town Ethics Code. Harold Loder has failed to recuse himself from matters involving the proposed Constitution Pipeline project creating the appearance of impropriety.

Harold Loder's violations of the Town Ethics Code must be considered knowing and intentional in light of the Town Supervisor's 2009 correspondence which appropriately admonished the Planning board to "be extremely cognizant and aware of not only conflicts of interest and potential conflicts of interest, but matters which present an appearance of impropriety" and that "affected Planning Board members(s) must recuse himself/herself from not only voting, but also all discussions, actions, and deliberations involving such matters." According to your August 15, 2012 correspondence the Town Attorney was further to advise Harold Loder individually "concerning planning board issues related to Constitution pipeline and Cabot-Williams".

COMPANIES AND ORGANIZATIONS

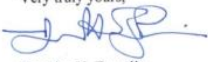
CO36 – Center for Sustainable Rural Communities (cont'd)

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CO36-2
cont'd

CSRC submits that Harold Loder's knowing and intentional violations of the Town Ethics Code in connection with his and his relatives' interests in the proposed Constitution pipeline project requires action in accordance with Section VII of the Town Ethics Code. CSRC requests that the Town Board promptly commence proceedings in accordance with Town Law Section 271(9). If the Town Board does not promptly commence such proceedings, CSRC reserves all its legal rights and remedies in these regards.

On behalf of CSRC, thank you in advance for your careful consideration and prompt action in this important matter.

Very truly yours,

Douglas H. Zamelis

cc:
Center for Sustainable Rural Communities, Inc.

COMPANIES AND ORGANIZATIONS

CO37 – Kernan Land Trust

S-358

BEFORE THE UNITED STATES OF AMERICA FEDERAL ENERGY REGULATORY COMMISSION		
Constitution Pipeline Project)	Docket No. CP13-499
)	
Wright Interconnect Project)	Docket No. CP13-502
CO37-1	COMMENTS OF THE KERNAN FAMILY TRUST URGING REJECTION OF THE DRAFT ENVIRONMENTAL IMPACT STATEMENT FOR THE CONSTITUTION PIPELINE	
	I. INTRODUCTION	
	<p>The Henry S. Kernan Family Land Trust (Trust) submits these comments on the Draft Environmental Impact Statement (DEIS) prepared by the Commission for the Constitution Pipeline and Wright Interconnect Project and issued on February 12, 2014. As described in these comments, the DEIS contains factual inaccuracies and information gaps (critically, the DEIS scarcely mentions the Trust lands at all) , fails to acknowledge the unique nature of the Trust property, ignores scientific data and expert opinions showing the pipeline’s irreparable impacts on Trust lands, rejects viable project alternatives with scant explanation, defers submission of mitigation until the deadline for comment on the DEIS has closed and endorses premature and unlawful approval of the project in advance of issuance of required federal authorizations. Taken together, these errors and omissions preclude meaningful public comment as required by the National Environmental Police Act (NEPA) and render the</p>	

CO37-1 See the response to comment FA1-1.

COMPANIES AND ORGANIZATIONS

CO37 – Kernan Land Trust (cont’d)

S-359

CO37-1 cont'd	<p>DEIS fatally flawed as a matter of law. Moreover, given that the Constitution pipeline, if approved, will necessitate widespread use of eminent domain, a rigorous “hard look” at the need for the project and its impacts as required by NEPA takes on even greater importance.</p> <p>Accordingly, the Trust asks the Commission to rescind the existing DEIS or issue a Supplemental or corrected DEIS based on accurate data and that recommends an alternative that avoids the Trust lands entirely. See 40 C.F.R. §1502.9 (stating that if DEIS is so inadequate as to preclude meaningful analysis, the agency shall prepare and circulate a revised draft of the appropriate portion).</p> <p>II. OVERVIEW</p>
CO37-2	<p>The Kernan Family Trust owns a 924-acre tract of land known as the Charlotte Forest in the Town of Harpersfield, Delaware County, New York. Managed for public benefit by the Kernan family for more than sixty-five years, the Charlotte Forest has served as a model of exemplary forest management by the New York Department of Environmental Conservation in six feature articles published in the NYSDEC’s own “The Conservationist” magazine between 1956 and 2006. These same Trust lands now face permanent damage by the proposed Constitution pipeline, which will cut a swath through and irreparably disrupt an approximately one-mile stretch of unfragmented, productive forest and pristine wetlands.</p> <p>2</p>

CO37-2 See the response to comment CO4-1.

COMPANIES AND ORGANIZATIONS

CO37 – Kernan Land Trust (cont’d)

CO37-2
cont'd

Since August 2012, the Trust has worked tirelessly to bring to Constitution’s attention the devastating impact that the proposed pipeline will have on the Trust lands and to persuade Constitution to consider an alternative route that would avoid the property.¹ Constitution essentially ignored the Trust during the pre-filing stage of the proceeding. But once its application was filed, Constitution turned around and rejected the Trust’s proposed alternatives, claiming that a final route had already been selected and the time for making changes had passed.

Having failed to persuade Constitution to avoid the Trust lands, the Trust appealed to the Commission. On December 5, 2013, the Trust submitted a comprehensive package prepared by the Trust’s environmental consultants, which contained a detailed description of the pipeline’s impacts to Trust lands (including an expert opinion on the permanent nature of the impacts due to the introduction of invasive species to the Trust properties), a preliminary correction to Constitution’s wetlands delineation and two well-developed viable alternative routes that would avoid Trust lands. Subsequently, on January 8, 2014, undersigned counsel for the Trust submitted a letter asserting the legal support for the Trust’s preferred route.

¹ See, e.g., Letter of Trust Counsel (January 8, 2014)(describing history of the Trust’s aborted negotiations with Constitution Pipeline).

² See Blossey Opinion, December 5, 2013 Submission.

³ See DEIS Table at 3.4.3-1.

⁴ See Trust Counsel Letter (March 10, 2014), B. Kernan Letter (March 12, 2014) and Stephen Gross Letter (March 26, 2014).

⁵ To avoid redundancy, these comments do not address the full panoply of

COMPANIES AND ORGANIZATIONS

CO37 – Kernan Land Trust (cont’d)

S-361

CO37-2 cont'd	Yet as was the case with Constitution, the Trust’s extensive submissions went ignored by the Commission, as evidenced by the DEIS. The DEIS hardly mentions the Trust lands or the devastating impacts that would result from the pipeline crossing the property. Nor does the DEIS mention or respond to Dr. Bernd Blossey’s opinion that the pipeline would cause irreparable harm by introducing invasive species to the pristine Trust wetlands – and that there is simply no effective way to mitigate these impacts except for the pipeline to avoid the Trust lands entirely. ²
CO37-3	
CO37-4	Finally, the DEIS rejected the Trust’s proposed minor route deviations in cursory and cryptic fashion, claiming that there were unidentified “issues” with the propane pipeline which precluded use of the right-of-way for the Constitution line, and suggesting that the alternative might impact additional landowners -- notwithstanding that their property is already encumbered by the propane line. ³
CO37-5	Perhaps recognizing the serious deficiencies in the DEIS, the Commission directed Constitution to attempt to resolve the Trust’s concerns and to submit additional information by the close of the comment period on mitigation if the property could not be avoided. But in doing so, the Commission merely compounded the problems in the DEIS as the Trust will not have an opportunity to respond to Constitution’s submissions. For that reason, the Trust filed three requests for an
	² See Blossey Opinion, December 5, 2013 Submission.
	³ See DEIS Table at 3.4.3-1.
	4

CO37-3 See the responses to comments FA4-9, FA6-10, and CO4-2.

CO37-4 See the response to comment CO5-12.

CO37-5 See the response to comments FA1-1, CO4-1, and CO5-10.

COMPANIES AND ORGANIZATIONS

CO37 – Kernan Land Trust (cont'd)

CO37-5
cont'd

extension of time to submit comments,⁴ as did multiple other intervenors. Yet as of the date of this filing, the Commission has not granted the extension, thus leaving the Trust no choice but to file comments on a deficient and vague DEIS.

III. SUMMARY OF ARGUMENT

The Trust has prepared three sets of comments on the DEIS: (1) comments by Bruce Kernan on behalf of the Kernan family; (2) Comments by environmental consultant Stephen Gross of Hudson Highlands Environmental Consulting criticizing the DEIS' flawed environmental analysis and conclusions and (3) this set by undersigned counsel which focuses on the legal deficiencies in the DEIS.⁵

Specifically:

- The DEIS ignores the unique nature of the Trust property as required by CEQ regulation 1508.(b)(3) and fails to describe the Trust lands and the pipeline's expected impacts in a manner "commensurate with the importance of the impact" as required by CEQ regulation Section 1502.15 to evaluate the significance of the pipeline's environmental impacts.

⁴ See Trust Counsel Letter (March 10, 2014), B. Kernan Letter (March 12, 2014) and Stephen Gross Letter (March 26, 2014).

⁵ To avoid redundancy, these comments do not address the full panoply of impacts caused by the pipeline which include, but are not limited to economic impacts related to devaluation of property abutting the pipeline route, interference with timber harvesting operations on the property, the anticipated widespread use of eminent domain to acquire a right-of-way for the project and cumulative impacts associated with development of Marcellus Shale. These subjects are discussed at length in comments submitted on behalf of the Trust by Bruce Kernan and Stephen Gross, the Trust's environmental consultant.

COMPANIES AND ORGANIZATIONS

CO37 – Kernan Land Trust (cont’d)

S-363

CO37-6	<ul style="list-style-type: none"> The DEIS is full of factual errors and mischaracterizations that prevent meaningful public comment and skew the conclusions in favor of Constitution’s preferred alternative.
CO37-7	<ul style="list-style-type: none"> The DEIS’ failure to address expert scientific testimony submitted by the Trust or to identify the methodology used to evaluate the impacts on Trust lands detracts from the scientific integrity of the analysis as required by Section 1502.24 of the CEQ regulations and bars both the full Commission or a court from according deference to the DEIS’ conclusions regarding the pipeline’s impacts on Trust lands.
CO37-8	<ul style="list-style-type: none"> The DEIS rejected several proposed alternatives in cursory fashion, either for unlawful or irrational reasons and improperly deferred evaluation of mitigation until after the close of the comment period, thereby precluding public comment and violating Section 1502.14(f) of the CEQ regulations.
CO37-9	<ul style="list-style-type: none"> The DEIS improperly elevates the significance of temporary impacts to the landowners purportedly impacted by the Trust’s alternatives over permanent, adverse impacts to greenfield property such as the Trust lands in violation of Commission regulation 380.15 and established precedent.
CO37-10	<ul style="list-style-type: none"> The DEIS prematurely concludes that Constitution’s pipeline will not have significant impacts to the environment even though Constitution has not yet received key federal authorizations (such as a Section 401 water quality certificate or Section 404 permit) necessary to develop the pipeline.
IV. ARGUMENT	
CO37-11	<p>A. The DEIS Ignores the Unique Nature of the Trust Property and Ignores the Intensity of the Impacts.</p> <p>An agency must consider both the context and intensity of the proposed action in order to determine whether it will result in significant environmental impacts. <i>See National Parks and Conservation Ass’n. v. Babbitt</i>, 241 F.3d 722, 731 (9th Cir. 2001).</p>

CO37-6	The commentor’s statements regarding the draft EIS are noted.
CO37-7	See the response to comment CO4-2.
CO37-8	See the response to comment CO5-10. See also the response to comment CO4-2.
CO37-9	See the response to comment CO4-2.
CO37-10	Section 401 and 404 permits are discussed in section 1.2 of the EIS. These permits may be issued following the NEPA review by the appropriate agency. As stated in section 1.5, Constitution and Iroquois would be responsible for obtaining all permits and approvals. Further as stated in recommendation 8 of the EIS, the Applicants would not be allowed to begin construction until they obtain all necessary federal permits. In some cases, permitting may not be completed until all field surveys are complete; and field surveys in some locations will be dependent upon acquisition of survey access. Survey access in some locations will be dependent on whether the Commission decides to grant a Certificate for the project.
CO37-11	See the responses to comments CO4-2 and CO5-12.

COMPANIES AND ORGANIZATIONS

CO37 – Kernan Land Trust (cont'd)

S-364

CO37-11
conf'd

Intensity refers to the severity of the impact on the surrounding locale. Under the CEQ regulations, an agency evaluating the "intensity" of project impacts must consider:

Unique characteristics of the geographic area such as proximity to historic or cultural resources, park lands, prime farmlands, wetlands, wild and scenic rivers, or ecologically critical areas.

See 40 C.F.R. §1508.27(b)(3).

Yet never once does the DEIS acknowledge the unique characteristics of the Trust property and its historic and ecologic significance within the region. This is so, notwithstanding the Trust's multiple submissions in the pre-filing proceeding, culminating with a lengthy report on the Trust property filed on December 5, 2013. As the report described, the Trust property encompasses 924 acres of land known as the Charlotte Forest in the Town of Harpersfield, Delaware County, New York. Managed for public benefit by the Kernan family for more than sixty-five years, the Charlotte Forest has served as a model of exemplary forest management by the New York Department of Environmental Conservation in six feature articles published in the NYSDEC's own "The Conservationist" magazine between 1956 and 2006.

The Trust property is also an ecologically critical area within the meaning of Section 1508.27(b)(3) of the CEQ regulations. The property encompasses an approximately one-mile stretch of unfragmented, productive forest -- one of northern Delaware County's last large non-fragmented block of interior forest. *See The*

COMPANIES AND ORGANIZATIONS

CO37 – Kernan Land Trust (cont’d)

S-365

CO37-11
cont'd

Charlotte Forest Under Threat, Trust Environmental Analysis. In addition, Clapper and Mud Lakes, that occur within and adjacent to the Charlotte Forest contain unspoiled wetland structural groups, habitat of endangered and threatened plant and animal species, and animal species in abundance or diversity unusual for New York State and the Catskill Region. Unlike almost every other water body in New York State, these wetland complexes have no invasive plant species. In fact, the pristine quality of the wetlands is so unusual that it prompted Dr. Bernd Blossey to opine that “the property qualifies as such a unique place, [that the pipeline should] avoid the destruction of intact plant communities at all costs...”*See Blossey Letter, Appendix A to Trust Environmental Analysis.*

Because of these unique characteristics of the Trust property, the intensity of the pipeline’s impacts is severe. The pipeline will disrupt the unfragmented block of forest and introduce invasive species into the pristine wetlands, ultimately destroying this ecologically critical area. The intensity of the pipeline’s impacts on the Trust property cry out for heightened scrutiny in the DEIS. Instead, the Trust property scarcely drew mention.

That the DEIS was required to describe the Trust lands and analyze the impacts in depth is bolstered by Section 1502.15 of the CEQ regulations, which state in relevant part that:

The environmental impact statement shall succinctly describe the environment of the area(s) to be affected or created by the alternatives

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CO37 – Kernan Land Trust (cont'd)

CO37-11
cont'd

under consideration. The descriptions shall be no longer than is necessary to understand the effects of the alternatives. **Data and analyses in a statement shall be commensurate with the importance of the impact**, with less important material summarized, consolidated, or simply referenced....

Section 1502.15 is intended to ensure that both the public and the decision-makers have sufficient information about the context , intensity and scope of the project impacts.

The DEIS falls short of Section 1502.15's requirements. The DEIS neither describes the Trust lands in a manner sufficient to understand the effects of the project and alternatives or analyzes the impacts in a manner commensurate with their importance. In fact, the DEIS is so utterly lacking in details about the Trust property that those unfamiliar with the pipeline would never guess based on reading the DEIS alone, that the pipeline will cut through and irreparably harm this unique resource.

In addition to potential harm to Trust lands, there is a second reason that the Commission's duty under Section 1502.15 to evaluate the project "commensurate with the scope of the impacts is so important: the potential for widespread use of eminent domain of greenfield properties. The 124-mile pipeline will cross through dozens of privately owned properties, and if landowners are not willing to "voluntarily" negotiate access agreements, Constitution may avail itself of eminent domain under Section 7f(h) of the Natural Gas Act. Moreover, as described in Mr. Kernan's

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CO37-11
cont'd

Comments No. 95-96, Constitution has already threatened landowners with use of eminent domain to pressure them to enter into easement agreements even before the pipeline certificate has been granted.⁶ The Commission has directed Constitution to explore the impact of the pipeline on landowners' ability to obtain insurance – but there is little discussion of the economic harm that landowners will suffer as a result of Constitution's taking of an easement, not to mention the diminished property value of the remainder. The Commission's Certificate Policy Statement requires the Commission to give special attention to project impacts on landowners – yet the DEIS does not take these impacts into account.

As such, the DEIS must be rescinded or substantially revised to focus attention on impacts to the Trust property and to adopt or develop alternatives to avoid this harm. *See Native Ecosystems Council v. Forest Service*, 418 F.3d 953, 965 (9th Cir. 2005)(noting that EIS must be revised where information is so incomplete that neither the decision-makers nor the public could make an

⁶ The representation by some of Constitution's land agents that Constitution has eminent domain rights in order to pressure landowners into negotiation is misleading. Under Section 7f(h) of the NGA, Constitution's eminent domain power does not attach unless and until the Commission issues a certificate – which may not happen for months, if at all. Moreover, even if the Commission does grant a certificate, Constitution can only condemn only those properties within the project footprint, and may only use the easement for the purposes described in the certificate. At a minimum, Constitution's agents should be required to disclose all of these caveats when approaching landowners to acquire easement rights.

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CO37 – Kernan Land Trust (cont’d)

CO37-11
cont'd

informed decision about the project and its alternatives). sufficient information
to “foster both informed decision making and informed public participation.

CO37-12

B. The DEIS Does Not Address Expert Scientific Opinions Submitted by the Trust.

Section 1502.24 of the CEQ regulations emphasizes that “agencies shall insure the professional integrity, including scientific integrity, of the discussions and analyses in the environmental impact statements.” An agency must evaluate the scientific evidence presented, respond to opposing viewpoints and provide reasons for rejecting an expert’s analysis. *See Protect Our Communities v. Salazar*, Case No. 12-cv-2211 (S.D. Cal. 2013)(finding that agency’s consideration of expert opinions by petitioners along with agency experts satisfied NEPA). Failure to address expert opinions will result in invalidation of the agency’s EIS. *See Western Watersheds v. Kraayenbrink*, 632 F.3d 472, 492 (9th Cir. 2010)(remanding EIS where BLM failed to address concerns about project’s impacts raised by its own experts as well as other federal and state agency experts); *Lands Council v. McNair*, 537 F.3d 981, 1001 (9th Cir. Idaho 2008)(reaffirming that agency “must acknowledge and respond to comments by outside parties that raise significant scientific uncertainties” with reasonable support).

The DEIS did not evaluate or respond to the expert opinions that the Trust submitted. Indeed, the DEIS’ sole acknowledgement to impacts to the Trust lands references “landowner letters” (DEIS 4-125), without any mention of

CO37-12

See the response to comment CO4-2.

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CO37-12 cont'd	<p>the extensive professional reports and expert opinions submitted to document these impacts. See DEIS 4-125.</p> <p>Most significantly, the Trust’s December 5, 2013 submission included a letter from Dr. Bernd Blossey, Associate Professor and Director, Ecology and Management of Invasive Plants Program at Cornell University and the top expert on invasive species in New York State, along with reports by Bagdon Environmental and James Barbour of Hudson Highlands. All three experts highlighted the complete absence of invasive species from the Trust lands as a rare occurrence in New York state. Moreover, Dr. Blossey opined that the pipeline would introduce invasive species that once present, could never be eliminated from the property. Yet, no mention of these expert analyses can be found in the DEIS.</p> <p>Not only did the DEIS ignore the Trust’s experts, but it does not rely on any expert reports or opinions by environmental scientists or wetlands or forestry experts to support its own conclusions. The DEIS’ failure to address expert opinions submitted by the Trust, which were based on site visits and sound science along with its lack of expert support for any of the analysis are fatal omissions that gut the scientific integrity of the entire document in violation of Section 1502.24 and invalidate the entire DEIS.</p>
CO37-13	<p>C. The DEIS Is Packed With Factual Errors and Mischaracterizations.</p>

CO37-13	<p>See the response to CO5-4. Constitution’s wetland investigators do not have survey access permission for the Trust parcel. The Trust’s “preliminary” wetland boundary was not supported by a wetland delineation for our comparison. The Trust and its consultant’s assert that the Commission used “bad” data which resulted in a “bad analysis.” However, we used the best available data that we could obtain given that the Trust denied Constitution the opportunity to conduct a wetland delineation on the property.</p>
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CO37 – Kernan Land Trust (cont'd)

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cont'd

Section 1500.1(b) of the CEQ regulations require that an EIS contain high-quality and accurate data and scientific analysis. An EIS based on factual mistakes and mischaracterizations of project impacts misleads the public and decision-makers as to the true scope of the project's impacts. *See, e.g. Native Ecosystems Council v. US Forest Service*, 414 F.3d 953, 965 (9th Cir. 2005)(holding that use of improper data failed to provide a full and fair discussion of project impacts). For that reason, courts routinely reject environmental assessments based on inaccurate data or flawed methodology.

For example, in *Lands Council v. Powell*, 395 F. 3d 1019 (9th Cir. 2005), the court invalidated the Forest Service's EIS which relied on stale data about available trout habitat, thereby preventing an accurate cumulative impact assessment of the project on the habitat and population of the Westslope Cutthroat Trout. In another case, *National Ecosystems Council v. U.S. Forest Service*, 418 F.3d 953 at 965 the court found that the agency failed to take a hard look at a project's "true impacts" on elk hiding cover when it examined impacts over a 24,000 acre range area rather than the actual range area which was 5000 acres larger. And in *Lands Council v. Powell*, 395 F. 3d 1019 (9th Cir. 2005), the court held that the Forest Service's use of a flawed methodology as a proxy for calculating species population trends in its EIS that violated NEPA.

Here, Commission's DEIS suffers from many of the same factual infirmities that doomed the EIS' in the above cases. As detailed in the Trust environmental

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CO37-13
cont’d

consultant Stephen Gross’ comments, the methodology employed in the DEIS to gather data on impacted wetlands substantially understates the total affected acreage. *See* Gross Comments D-3, E-1. As Gross explained, the Commission relied on sources such as publicly available National Wetlands Inventory (NWI) and state wetlands maps to approximate the location of wetlands within the project area, even though this methodology successfully identified only about 11 percent of the amount of wetlands that were field located.

In the case of the wetland conditions that exist on the Kernan property, the Commission’s methodology failed to detect any part of an unmapped wetland complex that lays between and connects to the NYSDEC-regulated Mud Pond and Clapper Lake wetlands. Gross Comment E-2. Yet, the Commission never corrected this error even though the Trust’s December 5, 2013 Environmental Analysis provided a map depicting the preliminary boundaries of the wetlands on their property. *See* Gross Comment E-3.

Not only does the DEIS omit wetlands on the Kernan property from its assessment of impacted areas, it also excludes newly delineated wetlands that are part of larger wetlands designated as NYSDEC regulated wetlands. Gross Comment E-4. When the newly designated NYSDEC wetlands are included, at least 7.19 acres of NYSDEC wetlands are impacted rather than the 4.4 acres currently identified in the

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CO37 – Kernan Land Trust (cont’d)

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cont'd

DEIS. Moreover, this total will increase when the wetlands on the Kernan Trust property are accounted for. Gross Comment E-5.

The DEIS' use of desktop data skewed the alternatives analysis as well. As noted by Mr. Gross in Comment D-12:

It was noted elsewhere in the DEIS that many of the numbers found in the alternatives comparison tables and discussions are not based on actual field data, but rather "desktop" analyses because field data is not available for the alternative routes. While it is understandable that the authors would seek to compare data that was equivalent in its accuracy, bad data can yield nothing but bad analyses. For instance, in this table, actual field data for the Proposed Route Segment 5/6 indicates that the proposed route will cross approximately 20,347 linear feet (3.85 miles) of wetlands. The desktop analysis, however only finds there to be 2,275 linear feet (0.43 mile) of wetland crossing. The desktop analysis therefore failed to detect 89% of the wetlands confirmed to be present along the route by field inspection. This is far too large an error for the comparative analysis to be considered to be at all reliable.

The DEIS' failure to accurately describe the amount of affected wetlands – both on the Kernan's property and along the entire pipeline route -- prevents meaningful public participation and downplays the severity of the pipeline's overall impact. As such, the DEIS violates NEPA and must be invalidated or corrected so that the public and decision-makers understand the full extent of the pipeline's impacts.

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CO37-14

D. The DEIS Improperly Prioritizes The Significance of Temporary Impacts to Disturbed Areas Over Enduring Adverse Impacts to Greenfield Lands.

When confronted with competing alternatives, the Commission leans towards those options that have short-term effects rather than permanent adverse impacts.⁷ In a recent dissenting opinion, Commissioner LaFleur criticized Commission staff for recommending an option with long-term impacts rather than one with temporary effects. *Millennium Pipeline*, 140 FERC ¶ 61,045 (2012)(LaFleur, dissenting):

The EA incorrectly equates temporary environmental impacts due to construction of the Wagoner Alternative with permanent residual impacts of the Minisink proposal, and therefore makes an invalid comparison...These omissions from the [EA] are inconsistent with previous environmental analyses performed by Commission staff. When these findings are corrected, the Wagoner Alternative demonstrates a significant environmental advantage over the proposed project, and the EA should have found as much.

The DEIS for the Constitution Pipeline commits the same error described by Commissioner LaFleur. Constitution's proposed route through the Trust lands will have significant, irreversible, long-term negative environmental effects by introducing invasive species to currently pristine property. As Dr. Bernd Blossey, an Associate Professor at Cornell University notes, restoration of wetlands degraded by invasive

⁷ See, e.g., *Central New York Oil & Gas Company, LLC*, 137 FERC ¶61,211, 61,643 (2011)(noting that reduced carbon sequestration due to tree removal is short-term impact that will revert to pre-existing conditions); *Florida Gas Transmission Co.*, 129 FERC ¶61,150 at para. 29 (noting that most impacts are short term, and further, will be reduced to less than significant levels with mitigation). *Transwestern Pipeline*, 121 FERC ¶61,175 at 61,181 (finding that alternative stream crossing method will have short term impacts and is therefore acceptable).

CO37-14

See the responses to comments FA4-9, FA6-10, and CO4-2. We have updated section 3.4.3 of the EIS with the new information and with our conclusion regarding route and construction alternatives and potential impacts upon the Trust property.

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cont'd

species introduced by pipeline construction is nearly impossible and likely to fail (Trust December 5, 2012 Comments, Appendix A, Gross Comments E-12). Because the damage wrought by the current pipeline route through the Trust lands would be permanent, the Commission's precedent requires that avoidance of these long-term impacts take priority over minimizing short-term impacts at other locations. Yet the DEIS failed to acknowledge the severe, permanent nature of the impacts to the Trust property, let alone recommend an alternative that would have lesser, short-term effects. Accordingly, the DEIS should be revised to bring it into compliance with Commissioner precedent.

CO37-15

E. The DEIS Inadequately Considers or Inaccurately Compares Some Alternatives While Unlawfully Rejecting Others

1. Inadequate consideration of alternatives

According to Sec. 1502.14 of the CEQ regulations, alternatives are the heart of the environmental impact statement. To comply with NEPA, an agency must rigorously explore and objectively evaluate all reasonable alternatives. *Id.* The 'touchstone' for courts reviewing challenges to an EIS under NEPA 'is whether an EIS' selection and discussion of alternatives fosters informed decision-making and informed public participation." *Westlands Water Dist. v. US Dept. of Interior*, 376 F. 3d 853, 862 (9th Cir. 2004).

CO37-15

The conclusions in the draft EIS did not reject any minor route variations in regard to the Trust property; rather, we again sought to facilitate additional assessment of alternatives. See the responses to comments CO4-1, CO4-2 and CO5-10. See the response to comment CO12-3 regarding the propane line. See the responses to comments SA4-1, SA4-2, SA4-3, and SA4-4 regarding alternative M. See the response to comment CO2-1 regarding Section 380.15(b) of the Commission's siting guidelines.

Typically, the FERC does not require field data for initial evaluations of alternatives. Additionally, it is most appropriate to compare equivalent source types of data in an alternatives analysis, such as all desktop data (or all field data), as opposed to mixing data types even if field data are available for one scenario. The use of two different data source types can lead to inaccurate, inappropriate, or unfair comparisons between two routes or scenarios.

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The Commission’s DEIS falls short of supplying adequate information required for meaningful participation. As Mr. Gross’ comments describe (Comment D-17), of the eight minor route variations submitted by the Trust, the DEIS evaluated only five, or possibly seven, but does not specify which ones. Unfortunately, without knowing which specific route alternatives were reviewed, it is difficult respond to the DEIS’ reasons for their rejection.

Even where one aspect of the alternative studied can be discerned, the DEIS offers only a cursory and vague explanation of the reasons for its rejection. For example, three alternatives proposed by the Trust involved moving the pipeline off the Trust lands and collocating a portion of it in the right-of-way for an existing propane pipeline. The DEIS rejected this option, citing documented safety issues with the propane line (DEIS Table at 3.4.3-1 and Appendix H-2), -- but included no substantiation for its conclusion. Essentially, the DEIS asks the public and decision makers to take its word that safety issues preclude adoption of the Trust’s alternatives, instead of disclosing the underlying data (if it actually exists) so that the public and the decision-makers can understand and weigh the putative risks of the Trust’s proposed alternative against its substantive benefits.

2. Inaccurate comparisons of alternatives

Agencies must accurately describe the project alternatives evaluated in the EIS to avoid skewing the results in favor of the applicant’s proposal. On several

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CO37-15 cont'd	<p>occasions, courts have invalidated an EIS where the agency assumed that the no-action alternative would include some aspects of the proposed project, thereby artificially minimizing the differences between the no-action alternative and the proposal. <i>See NC Wildlife v. NC Dep't. of Transportation</i>, 677 F.3d 596 (4th Cir. 2012)(remanding EIS where agency's erroneous inclusion of highway connector as part of "no build" alternative mislead the public by downplaying the differences with the proposal), <i>Friends of Yosemite</i>, 520 F.3d 1024, 1026-1027 (9th Cir. 2008)(finding NEPA violation where "no-action" alternative assumed the existence of the very plan being proposed).</p> <p>Although the Commission did not mischaracterize the no-action alternative in the DEIS, it similarly distorted the comparison between alternatives by using the less accurate desktop data rather than available field data to describe the impacts of the proposed project. As discussed in Bruce Kernan's Comment No. 50, the Commission relied on desktop sources to compare the applicant's proposal to Alternative M even though field data was available for much of the proposed route. By using desktop data, the Commission significantly under-estimated the area and number of wetlands that the proposed route would cross and further, ignored the qualitative differences between undisturbed upland wetlands that the proposed route will cross versus the already-disturbed wetlands that would be impacted by Alternative M. By ignoring field data, the Commission artificially minimized the severity of the Constitution's</p>
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proposal, thereby making Alternative M appear less advantageous by comparison – just as the mischaracterization of the no-action alternative in cases like *NC Wildlife* or *Friends of Yosemite* made the no-action alternative seem only marginally less damaging than the applicants' proposals.

By using desktop data to evaluate the applicant's proposal against Alternative M, the Commission skewed the comparison in the applicant's favor, while ignoring field data showing the serious adverse impacts that the proposed pipeline will have on the Trust lands and other properties along the pipeline. The DEIS' distorted comparison violates NEPA and misleads the public and decision-makers and must be corrected. *NC Wildlife*, 677 F.3d 596 (noting that agency's failure to disclose the erroneous data used to describe the no-build alternative mislead the public).

3. Unlawful rejection of alternatives

An agency's reason for disregarding or rejecting project alternatives must comply with applicable law. For example, the DEIS may not exclude consideration of an alternative because it is infeasible or falls outside the agency's jurisdiction. *See Muckleshoot Indian Tribe v. U.S. Forest Service*, 177 F.3d 800, 814 (9th Cir. 1999)(finding NEPA violation when EIS failed to consider a reasonable alternative that fell outside of the lead agency's jurisdiction); *Natural Resources Defense Council v. Morton*, 458 F.2d 827, 837 (D.C. Cir. 1972)(stating that an alternative may not be excluded because it requires additional legislative or agency action to implement); *Colorado*

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CO37-15 cont'd	<p>Environmental Coalition v. Salazar, 875 F. Supp. 2d 1233, 1250 (Dist. Colo. 2012)(finding NEPA violation where BLM failed to consider community alternatives due to infeasibility).</p> <p>In addition, the DEIS’ rejection of an alternative, like any other agency action, must satisfy the requirements of the Administrative Procedure Act. Therefore, the DEIS rejection of an alternative must be based on substantial evidence, rational and consistent with the agency’s regulations and precedent.</p> <p>The Commission’s DEIS did not comply with these guidelines. Instead the DEIS either rejected alternatives merely on feasibility grounds or adopting the applicant’s proposal instead of other alternatives notwithstanding that the applicant’s preferred route is utterly inconsistent with the Commission’s regulations and policy favoring collocation and avoiding greenfield development.</p> <p>For example, in rejecting Alternative M, the Commission speculated that the route might ultimately prove infeasible because the NYDOT might refuse to grant Constitution an easement to collocate the highway along Route I-88, and because the federal property is involved, Constitution could not exercise eminent domain to acquire a right of way. See DEIS at p. 3-31, and 3.4.1.2. However, NEPA prevents an agency from disregarding an alternative simply because it appears infeasible.</p> <p>Moreover, the Commission’s conclusion that the I-88 route is infeasible is based on an inaccurate reading of the FHWA regulations. The Commission notes that</p>
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Constitution must comply with FHWA policy to collocate the pipeline in the I-88 corridor – but it misstates the FHWA requirements for securing an easement, erroneously suggesting that they do not allow collocation. *See* Gross Comment Comment D-6, Page 3-30, 3.4.1.2.

More seriously, the Commission's rejection of both the Alternative M alternative and the Trust's route variation (that would move the pipeline off Trust lands into an existing propane pipeline right-of-way) contradicts existing Commission regulations and policies. For example, Commission siting guideline 380.15 (b) requires consideration of "widening, or extension of existing rights-of-way" in locating proposed facilities and the Commission has determined in several cases, that siting a pipeline in an existing right-of-way has far less serious impacts on abutting landowners than cutting through greenfield area. *See, e.g., Transcontinental Gas Pipeline*, 124 FERC ¶61,160, P. 57 (2008). In addition, as mentioned earlier, the Commission views permanent, adverse project impacts as more serious than short-term or temporary effects. *See, e.g., Texas Eastern Transmission LP*, 141 FERC ¶61,043 (2012) (noting that effects such as noise and dust have short term impacts).

The Commission ignored these compelling policies when it rejected Alternative M and the Trust's route variation. As the DEIS describes, (Page 2-1, 2.1.1. Pipeline Facilities), "The pipeline route generally follows a greenfield (i.e., lands and vegetation, including adjacent areas, that are undisturbed or undeveloped) pathway

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cont'd

from northeastern Pennsylvania to south-central New York.” In fact, only 0.4 percent of the pipeline will actually be collocated in existing rights of way. By contrast, under Alternative M, a considerable portion of the pipeline will be collocated in an existing right of way – yet the DEIS fails to identify Alternative M’s superior compliance with Commission regulations as a significant advantage over the applicant’s proposal or to adequately explain the reasons that a more compliant alternative was rejected.

The Commission’s rationale for rejecting the Trust’s alternative is similarly inconsistent with Commission precedent. The Commission explained that moving the pipeline off the Trust lands into the existing propane pipeline right of way would impact an additional 26 landowners. While the 26 landowners were not identified in even the most general sense, the large number implies that it may include landowners whose property is already encumbered with the propane gas pipeline easement. However, because these landowners’ properties are already encumbered with a pipeline, any additional impacts resulting from collocation are marginal at best. Moreover the impacts from collocation with an existing right of way are short-term and temporary, while running the pipeline through Trust properties will cause permanent and irreversible damage. Had the Commission applied its existing policy requirements to its comparison of the Trust alternative to the applicant’s proposal, it would have readily concluded that the Trust alternative was the environmentally superior choice.

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CO37-16	<p>F. The DEIS Improperly Defers Evaluation of Many Mitigation Options Until After the Close of the Comment Period</p> <p>Sec. 1502.14(f) of the CEQ regulations requires an EIS to “include appropriate mitigation measures not already included in the proposed action or alternatives” and to evaluate whether mitigation offers an effective means to remediate significant environmental impacts. <i>See</i> 40 C.F.R. §1508.25(3)(b). To satisfy the CEQ regulations, the DEIS must describe any proposed mitigation in sufficient detail to ensure that environmental consequences have been fairly evaluated.” <i>Carmel-By-the-Sea v. U.S. Dep’t of Transp.</i>, 123 F.3d 1142, 1154 (9th Cir.1997). “A mere listing of mitigation measures is insufficient to qualify as the reasoned discussion required by NEPA.” <i>Northwest Indian Cemetery Protective Ass’n. v. Peterson</i>, 795 F.2d 688, 697 (9th Cir.1986); <i>Neighbors of Cuddy Mountain v. U.S. Forest Service</i>, 137 F.3d 1372, 1380 (9th Cir. 1998)(finding Forest Service’s “perfunctory listing” of mitigation measures for the Redband trout improper under NEPA). Finally, agencies must discuss mitigation options as part of their environmental analysis and may not defer consideration of mitigation measures until later on in the proceeding. <i>Northern Plains Resource v. Surface Transp. Bd.</i>, 668 F. 3d 1067, 1083 (9th Circuit 2011)(finding that agency failed to take hard look at environmental consequences when it postponed considerations of mitigation until after project approval).</p>
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CO37-16 See the response to comment FA1-1.

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Yet instead of taking the required hard look at mitigation options, the DEIS postpones review. For example, the DEIS directs Constitution to explain “how potential impacts on resources have been effectively avoided, minimized or mitigated” by the close of the DEIS comment period. See DEIS at 5-4. But unless the Commission reopens the comment period, the Trust will be denied an opportunity to comment on the proposed mitigation. Moreover, the Commission also failed to address Dr. Blosssey’s opinion that *no* form of mitigation can ever restore the Trust lands to their original, pristine condition once pipeline construction introduces invasive species to the property. Comment E-11: (Page 4-65, 4.4.4 Alternative Measures)

The DEIS also accepts Constitution’s promise to develop mitigation measures to address wetlands further down the line in the certificate process. One section of the DEIS describes that Constitution will develop a plan to revegetate the wetlands with native herbaceous and wood plant species (DEIS at 2-31) while another section references that Constitution will consult with appropriate federal or state agencies to develop a project-specific wetland restoration plan. (DEIS at 4-65). Still another section (p 4-52) directs constitution to “file with the Secretary a description of impacts and any proposed impact avoidance, minimization, and mitigation measures for each water-body that would not be directly crossed by the trench-line,

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CO37 – Kernan Land Trust (cont'd)

CO37-16
cont'd

but would be impacted by the construction right-of-way." *See also* Gross Comments

E-1.

Yet absent details about what these mitigation plans might include, the Commission cannot even begin to evaluate the effectiveness of the plans – which courts regard as an “essential component” of an EIS. *Northern Plains Resource v. Surface Transp. Bd.*, 668 F. 3d 1067, 1083 (9th Circuit 2011)(“An essential component of a reasonably complete mitigation discussion is an assessment of whether the proposed mitigation measures can be effective.”). Moreover, as a practical matter, if Constitution’s mitigation deemed ineffective later in the process, it will be far more difficult to make changes to the project when Constitution is mobilizing to start construction than at this point.⁸

Because the DEIS lacks adequate description of mitigation measures, it violates NEPA and the CEQ regulations. Accordingly, the Commission must rescind or correct the DEIS and reopen the comment period to allow for meaningful public participation.

⁸ In fact, as discussed in Bruce Kernan’s Comment No 51, any proposal to revegetate the Kernan lands - which contain nearly 200 plant species -- indicates a woeful lack of familiarity with actual conditions in the Clapper Lake wetlands. In short, any mitigation plan by Constitution insofar as it applies to the unique Kernan property, is likely to be ineffective in mitigating adverse impacts.

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CO37-17

G. The DEIS Prematurely Concludes that The Pipeline Will Not Have Significant Impacts Even Though Several Key Federal Authorizations Needed To Develop the Pipeline Have Not Yet Issued.

According to Table 1.5-1 of the DEIS, Constitution has not yet obtained numerous federal and state authorizations necessary to develop the pipeline. Some of these permits – for example, the Section 404 permits issued by the Corps of Engineers and the Section 401 water quality certificate address whether Constitution can cross wetlands or operate in compliance with air quality standards and therefore, are relevant to the Trust properties. Without the authorizations provided by these permits, Constitution cannot develop its project at all. Moreover, even if the authorizations are granted, the permitting agencies may impose conditions that are inconsistent with requirements in the EIS -- since federal agencies such as the Corps are not preempted by FERC, nor are state agencies such as the New York State Department of Environmental Conservation (NYSDEC) operating under the cloak of federal authority in implementing federal statutes such as the Clean Water Act.

Thus, the Commission cannot assume that these permits will be granted. Yet at the same time, the Commission cannot make findings of no significant impact in their absence because the outcome of the federal authorization process may change some of the Commission’s assumptions regarding impacts. For this reason, the Commission should hold the DEIS in abeyance until all permit proceedings are completed and then make a final decision on the certificate.

CO37-17

See the response to comment CO37-10. The Commission determines significance on the basis of environmental impacts, not on the outcomes of other permit authorizations. Our determination considers the application, best available data, and mitigation measures presented before us. In reviewing their respective federal permit authorizations, other agencies have the opportunity to impose additional restrictions or conditions on the Applicants that would likely only reduce a determination of a significant impact. Furthermore, the Commission may require additional mitigation or conditions to reduce impacts on the resources under the jurisdiction of the other federal permitting agencies.

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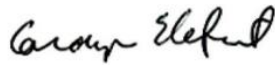
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V. CONCLUSION

The Commission's DEIS is fatally flawed. The DEIS lacks sufficient detail to allow for meaningful public comment and is permeated with inaccuracies, misstatements and departures from Commission regulations and policies which inevitably skew the DEIS' conclusions in favor of the applicant's proposal. Unless the Commission rescinds the DEIS or corrects the infirmities described herein and reopens the comment period, the Commission's final EIS will not survive judicial review.

Respectfully submitted,



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April 7, 2014

Kimberly D. Bose, Secretary
The FERC
888 First Street NE, Room 1A
Washington, D.C. 20426

US Army Corps of Engineers
New York District, CENAN-OP-R
Upstate Regulatory Field Office
1 Buffington Street, Bldg. 10, 3rd Floor
Watervliet, New York 12189-4000

Re: Docket Nos. CP13-499 and CP13-502; NAN-2012-00449-UBR

To Whom It May Concern,

A total of two commentors submitted this letter:
Louise Maher-Johnson (4-7-14)
Mark Russo (4-7-14)
both with Skyhill Farm

CO38-1 | COMMENT ON THE FAILURE OF FERC'S DEIS TO ADDRESS THE PERMANENT
NEGATIVE IMPACT TO GROUNDWATER AND PUBLIC WATER SUPPLIES IN THE AREA
OF AN EXPANDED WRIGHT COMPRESSOR STATION (WCS) DUE TO:

- | | | |
|--------|-----|---|
| CO38-2 | (1) | The vulnerability of the karst aquifers in the fragile karst terrain surrounding WCS, i.e., vulnerability to released pollutants during regular operation and in the event of a spill or explosion, and the vulnerability to pressure to water wells, caves, etc., in a karst area |
| CO38-2 | (2) | The existence of deep vertical faults in the WCS area as evidenced by the number of abandoned private water wells that have been naturally contaminated by methane and other elements from depths of thousands of feet—and the methane contamination to aquifers that already exists near the WCS |
| CO38-3 | (3) | The existence of at least four intersecting major earthquake fault lines that are located near the WCS and that travel through numerous NYS counties with potential of creating quakes as far south as reservoirs and water tunnels of NYC Watershed and as far southwest as Binghamton. |
| CO38-4 | (4) | The history of 100 and 500 year flooding events and numerous flash flooding events in the area, especially flooding just downhill of WCS into the Fox Creek and the principle aquifer beneath this creek. |
| CO38-5 | (5) | The amount and kind of pollutants that would likely be released at WCS and be available to seep into the soil and the karst aquifer. |
| CO38-6 | (6) | The lack of a comprehensive potential impact radius study for an explosion involving a 30 inch pipe at 1500 psi and for an explosion involving the four pipelines and several compressors at an expanded WCS |

C038-1

As stated in section 4.3.2.1 of the EIS, excavation for the proposed compressor station facilities is expected to be less than 6 feet deep. As discussed in the EIS, there can be 5 feet or less of overburden above the karst bedrock in that area. Iroquois does not anticipate the need for blasting. The existing Wright Compressor Station has been in operation within karst terrain since 1993 with no known impacts on surrounding groundwater. The FERC procedures, which have been adopted by Iroquois, require that “bulk storage of hazardous materials, including chemicals, fuels, and lubricating oils have appropriate secondary containment systems to prevent spills.”

As stated by Iroquois in its Resource Report 2, the construction phase at the Wright InterconnectProject “would involve the refueling of vehicles and storage of fuel, oil, and other fluids. Spills or leaks of hazardous liquids could potentially create a hazard to the groundwater system and ultimately affect its users. The potential for this impact is expected to be avoided or minimized by the proper implementation of the project’s SPCC (*author note – spill prevention, control, and countermeasures*) Plan. Iroquois is mandated through the FERC Procedures to prepare a site-specific SPCC Plan for the project that details preventative measures that shall be followed to avoid a hazardous waste spill as well as mitigation measures that would be followed to immediately contain and clean up a spill, should one occur.” The best management practices that would be used by Constitution during construction in areas of karst terrain are addressed in section 4.1.5 of the DEIS.

C038-2

Section 4.1.3.2 of the EIS discusses faults in the area of the proposed projects.

CO38-3

Section 4.1.3.1 of the EIS discusses earthquakes in the area of the proposed projects.

CO38-4

See the response to comment CO1-5 regarding flooding.

C038-5

See the response to comment CO38-1.

CO38-6

The formula for pipeline impact radius is provided in section 4.12.1 of the EIS. The potential impact radius for the proposed pipeline would be 796 feet. It is theoretically possible that the pipeline impact radius for multiple pipelines and a compressor station located in the same area could extend beyond the largest impact radius for any single one of the pipelines. However, this scenario would likely require the simultaneous ignition of multiple facilities.

COMPANIES AND ORGANIZATIONS

CO38 – Skyhill Farm LLC (cont’d)

S-387

DISCUSSION

- CO38-7 (1) The WCS and environs are vulnerable to emissions, spills and explosions and other problems due to rapid, multi-direction contaminant dispersal through KARST aquifers and terrain which cannot be mitigated
- The NYS DEC and other DEIS commenters have requested that FERC add research about KARST to its DEIS. The Wright Compressor Station (WCS) is surrounded by fragile soluble limestone formations called 'karst'.
- The research of two hydrogeologists who are experts on Karst and groundwater, and who have researched and written about karst in specifically in Schoharie County should be included in the DEIS. They are Paul Rubin of Hydroquest and Arthur Palmer, founder and emeritus of Water Resources at SUNY Oneonta.
- Rubin and Palmer agree that "Karst aquifers are the most vulnerable aquifers anywhere". Thus, the WCS is very vulnerable since it sits amidst karst limestone formations with a network of caves, caverns, sinkholes (hidden shafts covered with soil), sinking streams, and underground springs. These act as channels into the shallow groundwater of karst, and so permit surface pollutants from construction, compressor emissions, explosions and flooding, etc., to move rapidly into aquifers without being remediated by soil microorganisms, clay, sand, stone. Contaminants then disperse rapidly and unpredictably over large distances and in all directions, in the fast moving flow with many subsurface interconnections. In karst "groundwater velocities can be hundreds or thousands of time faster" than the norm elsewhere. As such, mitigation of these toxins would not be possible.
- Given this scenario for rapid contaminant dispersal, the affected population would be considerable and therefore the FERC Class 1 rural designation of the area of WCS is not accurate.
- The WCS is close to and uphill of the main Fox Creek aquifer that supplies drinking water to the towns of Schoharie and Central Bridge. And irrigation to Schoharie Valley Farm which has been selling its produce to NYC. Also, the Fox Creek Farm near to the WCS has between 200-300 families that buy its produce weekly from June to October. Thus, describing the area around the WCS as class 1 rural sparsely populated with low impact in case of accidents should be reconsidered. Since karst aquifer remediation is not possible, the contaminants will continue to travel down gradient in groundwater toward Schenectady and then Albany. The WCS is on the principal aquifer that is part of and feeds into the Mohawk River Basin as it heads to Albany's aquifers. Contaminants don't disappear.
- There are eight towns in Schoharie County that have karst formations, Cobleskill with its Howe Caverns and huge underground river is the most known example of a karst cave. Thus WCS is not the only vulnerable location
- It is also common knowledge in Schoharie County that drilling a new well can contaminate and/or close up a nearby well, either disruption caused by the pressures of drilling near karst. It is common knowledge that the minor blasting north of State Route 20 during the construction of the Tennessee Pipeline caused water wells up to a mile south in Carlisle to close up.
- Again the pressure from even minor blasting is augmented and can be carried afar through karst terrain. Both karst and karst aquifers are vulnerable to pressure.
- A buildup of methane inside karst caves can be explosive. Leaked methane from hydrofracking and pipeline leaks could well set off explosions in karst caves, which are home to endangered bats and visited by thousands of tourists annually.

CO38-7

See the response to comments LA4-2 and CO38-1. The description and listing of class designations is provided in section 4.12.1 of the EIS and is based on population density in the vicinity of the pipeline, not on the potential for contaminant dispersal.

COMPANIES AND ORGANIZATIONS

CO38 – Skyhill Farm LLC (cont'd)

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CO38-8

(2) The environs of WCS is rife with fault lines. The deep fault lines are known to carry naturally occurring methane and radon to the surface water wells. This is evidenced by the many abandoned water wells in Wright—abandoned due to methane contamination, which the DEC admits is a problem in Schoharie County in its SGEIS for hydrofracking.

Methane, as well as radon gas, travels upward through single deep vertical fractures, likened to the long stem of a flowering plant, which then opens up or blossoms in many directions when close to the earth's surface. Thus multiple water wells can be contaminated from a single deep fracture. Retired well-digger Oxberry whose home is near the WCS and whose land is crossed by one of the gas pipelines has kept a personal record of abandoned contaminated water wells in Wright, wells that he had dug in the past.

He says there are many other abandoned water wells in the vicinity. Thus, naturally occurring methane pollution is already a problem for the drinking water in this area without the potential of leakage from gas lines and compressor stations.

CO38-9

(3) What surely needs to be investigated in the DEIS is the potential negative impact of at least four intersecting major earthquake fault lines that are located near the WCS and that travel through numerous NYS counties. These faults have the potential to create quakes as far south as the reservoirs and water tunnels of the NYC Watershed and as far southwest as Binghamton.

The 2002 Fault Map of Robert Jacobi (Map 1, see below) indicates a starred and circled epicenter near Richmondville and Worcester, close to the route of the Constitution Pipeline (CP). This epicenter is on the two major fault lines (Scranton High Gravity Faults) shown extending from the NE corner of Schoharie County (the location of the WCS) and seeming to mimic the proposed route of the CP. These two fault lines intersect near Cobleskill with two other major lines (marked S and N for Sprakers and Noses Faults) that extend into the NYC Watershed and under the two aged Delaware Water Tunnels that transport water to the NYC metropolitan area. Two epicenters are circled inside the Watershed.

Note the second map contracted by the NYC Dept of Environmental Protection (DEP) and included as part of the DEP Comment in Jan 2012 to NYS DEC regarding problems with hydrofracking near the Delaware Water Tunnels (Map 2, see below). The NYC DEP map shows the seismicity surrounding the two Delaware tunnels, that is, seven extensive fault lines and many other fractures lay beneath the reservoirs and tunnels. This DEP map updates Jacobi's by adding many new fault lines.

Jacobi hypothesized the the "two seismic events [circles with stars] in Delaware County [in the Watershed] could be related to a southern extension of Sprakers Fault, the Scranton Gravity High Faults, or the intersection of these two trends." He posited that seismic events were not random and connections along a single fault or intersecting faults were possible. Also that, "Not only are there more faults than previously expected in NYS, but also, many of these faults are seismically active." (*Basement Faults and Seismicity in the Appalachian Basin of New York State*, p.105.)

Again, the NYC DEP completed its own study of fault lines within the Watershed. Public safety warrants an update of fault lines near WCS and along the entire route of the CP. And FERC should commission a study of the plausibility of a WCS explosion triggering a quake at epicenters near the NYC reservoirs and tunnels and elsewhere.

Certainly FERC should add a study of these existing earthquake fault maps to its DEIS and reassess the impact of an earthquake to water, life and property in its final EIS.

CO38-8

See the response to comments LA5-6 and CO38-2. Methane leakage is discussed in Section 4.11.1.

CO38-9

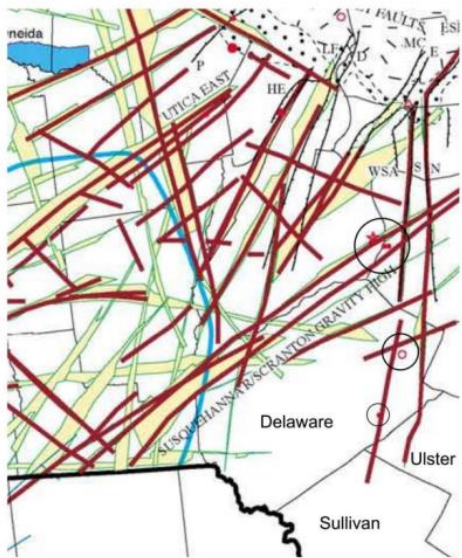
See the response to comment CO38-3. The seismicity noted on the R.D. Jacobi / Tectonics 353 (2002) 75-113 map is of very low magnitude. These events are too small to be felt or to cause damage to structures at the surface. This is consistent with the findings of the DEIS. The NYCDEP study cited by the commentor (Geophysical Evaluation of Infrastructure Risks of Natural Gas Production on New York City West of Hudson) Water Supply Infrastructure 2011) described the potential effects of induced seismicity associated with high volume hydraulic fracturing and recommended buffer distances if such activities were to occur. High volume hydraulic fracturing is not within the scope of the Constitution Pipeline Project, the Wright Interconnect Project, or the EIS.

COMPANIES AND ORGANIZATIONS

CO38 – Skyhill Farm LLC (cont'd)

CO38-9
cont'd

Map 1—Jacobi, 2002



Map of Confirmed and Proposed Faults- Segment (Jacobi, 2002), shows some of the major faults including the Sprakers and Noses Faults, labeled **S and N**, running south through six counties, including the NYC Watershed in Delaware, Sullivan, Greene and Ulster Counties. The two epicenters in the Watershed (small circles) are on the Sprakers. Note the Sprakers and Noses Faults in the "outdated" 1977 DEC map (to the left) terminate in Schoharie, just above the Watershed.

These two faults intersect with the Scranton High Gravity Faults running east/west through six counties. The star depicts an epicenter (East Worcester/Richmondville) that has had 91 earthquakes **in the past 40 years** (while the SGEIS indicated two in the same time period).

Jacobi hypothesized that the "two seismic events in Delaware County could be related to a southern extension of Sprakers Fault, the Scranton Gravity High faults, or the intersection of these two trends." He posited that seismic events were not random and connections along a single fault or intersecting faults were possible. Also that, "Not only are there more faults than previously expected in NYS, but also, many of these faults are seismically active." (*Basement Faults and Seismicity in the Appalachian Basin of New York State*, p.105). The NYC DEP has further extended the S and N faults, and identified both new fault lines and epicenters within its Watershed (Jan 2012).

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CO38 – Skyhill Farm LLC (cont’d)

CO38-11

(5)

Thirty-nine different pollutants would likely be released at WCS and be available to seep into the karst aquifers, according to a study by respected and credentialed chemist, Wilma Subra. These include nitrogen oxide, benzene, toluene, formaldehyde, etc. They would also create ozone in the area.

Subra worked with the residents of Minisink, NY, who were gathering information to change the location of a compression station in Minisink, and they have published the following, "At full capacity the proposed Minisink Compressor will release 61,000 tons of pollutants into the air each year, which would seep into the soil and the watershed."

The 12,260 horsepower of this proposed Minisink Compressor would be a fraction of even the expanded horsepower of the existing Iroquois pipeline at WCS (22,000hp). Add to this the compression needed on the Tennessee and the proposed CP at this single site. Such cumulative details on emitted pollutants need to be addressed in the EIS.

CO38-12

(6)

There is a need to correct the DEIS lack of a comprehensive Potential Impact Radius (PIR) for an explosion involving a 30 inch pipe at 1500 psi and for an explosion involving the four pipelines and several compressors at an expanded WCS. FERC and CP should consider checking the fact and figures culled by Intervenor Clark Rhoades' contrast of the El Paso, NM gas pipeline explosion with an explosion of a 30 inch pipeline with approximately 1500 psi of pressure. And then extrapolate the damage to life, and property that would result from an explosion at the future WCS. Clark Rhoades deduced that the minimum PIR of the CP 30" pipeline would be approximately 4400 feet.

Sincerely,

Louise Maher-Johnson

CO38-11 See the response to comment CO38-1. The comments regarding possible spills at the proposed Minisink Compressor Station are noted.

CO38-12 See the response to comment CO38-6.

COMPANIES AND ORGANIZATIONS

CO39 – Allegheny Defense Project

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Allegheny Defense Project

Protecting and Restoring the Forests of the Allegheny Bioregion

April 7, 2014

Re: Constitution Pipeline and Wright Interconnect Projects, Docket Nos. CP13-499-000 and CP13-502-000.

Kimberly D. Bose
Secretary
Federal Energy Regulatory Commission
888 First Street, NE
Washington, DC 20426

Attachments to this comment have been deleted as they do not pertain to the Constitution Pipeline DEIS. The attachments are available on the FERC eLibrary: http://elibrary.FERC.gov/dmws/file_list.asp?accession_num=20140407-5399

Dear Secretary Bose:

CO39-1

The following comments are submitted on behalf of the Allegheny Defense Project and our supporters regarding the Constitution Pipeline and Wright Interconnect Projects, Docket Nos. CP13-499-000 and CP13-502-000. On June 13, 2013, Constitution Pipeline Company (CPC) submitted an application with the Federal Energy Regulatory Commission ("FERC") for a certificate of public convenience and necessity to construct and operate approximately 122 miles of 30-inch diameter pipeline and related facilities in Susquehanna County, Pennsylvania, and Broome, Chenango, Delaware, and Schoharie Counties, New York. CPC also requested that FERC grant it a blanket certificate authorizing CPC to construct, operate, and abandon certain facilities under Part 157, Subpart F, of FERC's regulations and a blanket certificate authorizing CPC to provide transportation services on an open access and self-implementing basis under Part 284, Subpart G, of FERC's regulations. FERC published a Notice of Application on June 26, 2013.

On June 13, 2013, Iroquois Gas Transmission System (IGTS) submitted an application with FERC requesting authorization to construct, install, own, operate, and maintain certain new compression facilities to be located in Wright, New York, and to modify certain existing facilities at the same location, and to lease the incremental capacity associated with these new and modified facilities to CPC. FERC published a Notice of Application on June 26, 2013.

On February 12, 2014, FERC published a Notice of Availability of the Draft Environmental Impact Statement (DEIS) for both CPC's and IGTS's proposed projects. The projects are not in the public interest and FERC should deny both CPC's and IGTS's applications.¹ Pursuant to 18 C.F.R. § 385.211, Allegheny Defense Project protests both CPC's and IGTS's applications.

¹ For the purpose of these comments, when we refer to the "Constitution Pipeline Project" or "Project," we intend that to include both CPC's and IGTS's projects as they are connected actions being considered in the same DEIS. When it is necessary to specifically refer to one of the projects, we will do so.

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CO39-1

See the response to comments LA1-4 regarding a programmatic EIS. The cumulative impacts section of the EIS (4.13) has been expanded with new information. The commentor's statement to deny the proposed projects is noted.

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COMPANIES AND ORGANIZATIONS

CO39 – Allegheny Defense Project (cont'd)

S-393

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CO39-1
cont'd

I. Introduction

Over the past several years, FERC has approved numerous projects related to natural gas drilling infrastructure in the northeastern United States. Many of these projects have been in response to the shale gas drilling and fracking boom in states like Pennsylvania, Ohio, and West Virginia. FERC reviewed the environmental impacts for many, if not most, of these projects in environmental assessments (EAs) and subsequently issued a finding of no significant impact (FONSI) time after time.

FERC has been and continues to be aware of many companies' plans to exploit shale formations such as the Marcellus Shale. FERC has also identified expanding pipeline and storage infrastructure as essential to ensure that there is increased reliance on natural gas and that the gas is available. Indeed, FERC's actions are in alignment with and facilitate President Obama's repeated calls for increased reliance on natural gas as the dubiously titled "bridge fuel" toward an alleged "cleaner" energy future.

By reviewing many of these projects individually, FERC has minimized the scale of the cumulative impacts that have occurred and continue to occur as a result of increased shale gas extraction and transportation. These impacts are substantial and relate to our land, air, water, wildlife habitat, recreation opportunities, and climate change. FERC has avoided its responsibilities under the National Environmental Policy Act (NEPA) to review these connected, cumulative, and similar actions in the same environmental impact statement (EIS). As will be explained below, FERC must postpone action on these projects and begin the process of preparing a regional programmatic EIS regarding all dockets that have projects pending related to increasing capacity and use of shale gas in the northeastern United States. Without a programmatic analysis at the regional level, FERC is avoiding how pipelines such as the one proposed by CPC are impacting the forests, watersheds, air quality, wildlife habitat, and recreation opportunities throughout the region.

Even in this DEIS, FERC's cumulative effects analysis is far too narrow. FERC must take a hard look at how increasing capacity for shale gas transportation induces further natural gas extraction. This is key to understanding the cumulative impacts of approving projects such as the one under consideration here.

CO39-2

II. Certain "broad Federal actions" must be considered in a single EIS.

NEPA is "our basic national charter for protection of the environment" and all Federal agencies "share responsibility for enforcing the Act so as to achieve the substantive requirements of section 101." 40 C.F.R. § 1500.1(a). Importantly, "[p]roposals or parts of proposals which are related to each other closely enough to be, in effect, a single course of action shall be evaluated in a single impact statement."

In addition, CEQ regulations state that an EIS is required for certain "broad Federal actions[.]" 40 C.F.R. § 1502.4(b). In such cases, "[a]gencies shall prepare statements on broad actions so that they are relevant to policy and are timed to coincide with meaningful points in agency planning and decisionmaking." *Id.* CEQ regulations further provide that:

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CO39-2

The FERC staff reviews applications for interstate natural gas pipeline projects in accordance with an applicant's stated objective(s) in order to disclose the environmental impacts of a proposal to inform the decisionmakers and, in accordance with NEPA, evaluate reasonable alternatives to a project. However, the FERC as a matter of policy and in accordance with the Natural Gas Act and other governing regulations, does not direct the development of the gas industry's infrastructure regionally or on a project-by-project basis.

Unless proposed in tandem and clearly dependent upon each other, such as the proposed Constitution pipeline and Iroquois' Wright Interconnect projects, proposed projects must have demonstrably sufficient feasibility, purpose, and need to stand alone. Proposed projects may be based on supporting and existing infrastructure, but can't be based on theoretical projects whose certification status is uncertain. Preparation of a regional or programmatic EIS is not warranted for these reasons.

Even if the FERC were to develop a programmatic EIS for Marcellus Shale extraction, the resultant analysis would be for naught, as the FERC has no authority to direct its development, or impose mitigation measures or best management practices (where warranted) on the proponents of these types of projects.

COMPANIES AND ORGANIZATIONS

CO39 – Allegheny Defense Project (cont'd)

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CO39-2
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"[w]hen preparing statements on broad actions ... agencies may find it useful to evaluate the proposal(s) ... *[g]eographically*, including actions occurring in the same general location, such as body of water, *region*, or metropolitan area."

40 C.F.R. § 1502.4(c)(1).² CEQ guidance states that an EIS must be prepared if an agency proposes to implement a "specific policy" or "adopt[s] a plan for a group of related actions[.]" Council on Environmental Quality, Memorandum to Agencies: Forty Most Asked Questions Concerning CEQ's National Environmental Policy Act Regulations, 18 (1981). CEQ also advises that:

the preparation of an area-wide or overview EIS may be particularly useful when similar actions, viewed with other reasonably foreseeable or proposed agency actions, share coming timing or geography. For example, when a variety of energy projects may be located in a single watershed ... the overview or area-wide EIS would serve as a valuable and necessary analysis of the affected environment and the potential cumulative impacts of the reasonably foreseeable actions under that program or within that geographical area.

Id. (emphasis added).

In *Kleppe v. Sierra Club*, the Supreme Court declined to require various Federal agencies to prepare a regional EIS but only because "there [was] no evidence in the record of an action or a proposal for an action of regional scope." 400 U.S. 390, 400 (1976). As the Ninth Circuit has held, "[w]here there are large-scale plans for regional development, NEPA requires both a programmatic and a site-specific EIS." *City of Tenakee Springs v. Block*, 778 F.2d 1402, 1407 (9th Cir. 1985) (emphasis added). As will be explained below, there has been and continues to be action by the Federal government, including FERC, for "large-scale plans for regional development" – namely, to aggressively promote and actively facilitate the extraction of shale gas in the Marcellus Shale region.³ As such, FERC must prepare a programmatic regional EIS before any decision on this Project or any other project related to further exploitation of the Marcellus Shale is made.

CO39-3

A. The Obama administration has an affirmative policy to promote and facilitate the extraction of shale gas in the Marcellus Shale region.

In his 2014 State of the Union address, President Obama stated:

The all-of-the-above energy strategy I announced a few years ago is working, and today, America is closer to energy independence than we've been in decades. *One of the reasons why is natural gas* – if extracted safely – it's the bridge fuel that can power our

² See also 40 C.F.R. § 1502.4(c)(2), which calls for an EIS for broad Federal actions "which have relevant similarities, such as common timing, impacts, alternatives, methods of implementation, media, or subject matter."

³ In these comments, "Marcellus Shale region" generally refers to Pennsylvania, West Virginia, and Ohio where shale gas extraction has occurred the most in the Northeast / Mid-Atlantic region of the country. However, the term does not simply refer to "Marcellus" shale but rather all shale gas in this region, including, but not limited to, the Utica shale. "Marcellus Shale region" is simpler because of the widespread use of the term "Marcellus" but it should be so narrowly viewed.

CO39-3

The comments regarding President Obama's views and his administration's statements are noted. The FERC staff conducts an impartial, independent review of proposed projects. The final EIS as well as other non-environmental information (see section 1.2.1 of the EIS) will be used by the Commission in its decision-making process. The Commission's decisions are not subject to congressional or presidential review or challenge.

COMPANIES AND ORGANIZATIONS

CO39 – Allegheny Defense Project (cont'd)

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CO39-3
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economy with less of the carbon pollution that causes climate change. Businesses plan to invest almost \$100 billion in new factories that use natural gas. *I'll cut red tape to help states get those facilities built*, and this Congress can help by putting people to work building fueling stations that shift more cars and trucks from foreign oil to American natural gas. *My administration will keep working with the industry to sustain production and job growth while strengthening protection of our air, our water, and our communities.*

The White House, President Barack Obama's State of the Union Address, Jan. 28, 2014 (emphasis added). See <http://www.whitehouse.gov/the-press-office/2014/01/28/president-barack-obamas-state-union-address>. In a so-called "fact sheet" accompanying the 2014 State of the Union address, the President called on Congress to:

[W]ork with the Administration and State and local governments to create *Sustainable Shale Gas Growth Zones*, helping regions come together to make sure shale gas is developed in a safe, responsible way that helps build diverse and resilient regional economies that can withstand boom-and-bust cycles and can be leaders in building and deploying clean energy technologies. Smart regional planning and federal technical assistance to States and local communities can ensure we develop shale gas the right way – and, at the same time, create stable communities with well-paying jobs.

Opportunity for All: Key Executive Actions the President Will Take in 2014 (emphasis in original). See http://www.whitehouse.gov/sites/default/files/sotu_2014_main_fact_sheet.pdf. In other words, the Executive Branch is on record as not just supporting the extraction of natural gas in general, but specifically promoting the extraction of shale gas and the creation of "sustainable shale gas growth zones" in particular *regions*. This demonstrates that there is a broad Federal action to promote the extraction of shale gas in the Marcellus Shale and other shale gas regions.

This is not a new development either. On November 3, 2010, President Obama stated in a press conference that:

We've got, I think, broad agreement that we've got *terrific natural gas resources* in this country. *Are we doing everything we can to develop those?*

The White House, Press Conference by the President, Nov. 3, 2010 (emphasis added). See <http://www.whitehouse.gov/the-press-office/2010/11/03/press-conference-president>. The following day, the New York Times reported that:

Obama's remarks seemed to refer to vast new sources of shale gas in Pennsylvania, Texas and their neighboring states. Improvements in "hydraulic fracturing" technology have allowed production from formations under those states previously thought to be too expensive to exploit.

Soraghan, Mike. *Obama's Enthusiasm for Gas Drilling Raises Eyebrows*, The New York Times, Nov. 4, 2010. See <http://www.nytimes.com/gwire/2010/11/04/04greenwire-obamas-enthusiasm-for-gas-drilling-raises-eyeb-33483.html>.

In March 2011, President Obama stated:

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CO39-3
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Now, in terms of new sources of energy, we have a few different options. *The first is natural gas. Recent innovations have given us the opportunity to tap large reserves – perhaps a century's worth of reserves, a hundred years worth of reserves – in the shale under our feet [...] the potential for natural gas is enormous.* And this is an area where there's actually been some broad bipartisan agreement. Last year, more than 150 members of Congress from both sides of the aisle produced legislation *providing incentives to use clean-burning natural gas in our vehicles instead of oil.* And that's a big deal ... So I ask members of Congress and all the interested parties involved to keep at it, pass a bill that *helps us achieve the goal of extracting natural gas in a safe, environmentally sound way.*

The White House, Remarks by the President on America's Energy Security, Mar. 30, 2011 (emphasis added). See <http://www.whitehouse.gov/the-press-office/2011/03/30/remarks-president-americas-energy-security>. On May 6, 2011, President Obama stated that "we've got to have natural gas vehicles. We've got a lot of natural gas that can be produced here in the United States of America." The White House, Remarks by the President to Workers at Allison Transmission Headquarters, May 6, 2011. See <http://www.whitehouse.gov/the-press-office/2011/05/06/remarks-president-workers-allison-transmission-headquarters>.

In his 2012 State of the Union address, President Obama noted that "we have a supply of natural gas that can last America nearly 100 years" and that his administration "will take *every possible action to safely develop this energy.*" The White House, Remarks by the President in State of the Union Address, Jan. 24, 2012 (emphasis added). See <http://www.whitehouse.gov/the-press-office/2012/01/24/remarks-president-state-union-address>. A Bloomberg article from May 2012 describes President Obama's support for natural gas extraction as follows:

For a president who has drawn withering criticism from the energy industry on issues ranging from the Keystone XL pipeline to environmental restrictions on coal-fired power plants, the White House meeting – and a series of decisions that followed – illustrate *his embrace of one fossil fuel.*

While Obama put his initial emphasis as president on boosting solar panels and wind turbines, *natural gas is now front and center* even as skepticism about hydraulic fracturing, or fracking, is rising among Obama's environmental allies such as the Sierra Club ... At that April 13 meeting with trade groups representing companies including DuPont Co. (DD), Noble Energy Inc. (NBL) and Caterpillar Inc. (CAT), the *Obama administration unveiled an interagency task force to coordinate the development of natural gas.*

Drajem, Mark. Obama Warms to Energy Industry by Supporting Natural Gas, Bloomberg, May 9, 2012 (emphasis added). See <http://www.bloomberg.com/news/2012-05-09/obama-warms-to-energy-industry-by-supporting-natural-gas.html>. Following the April 13, 2012 meeting referenced in the Bloomberg article, the White House issued the following statement:

Today, OIRA Administrator Cass Sunstein and Deputy Assistant to the President for Energy and Climate policy Heather Zichal convened a White House meeting with key stakeholders, including representatives from the American Chemistry Council, the American Gas Association, the American Natural Gas Association, the American Petroleum Institute, the U.S. Chamber of Commerce, and the National Association of Manufacturers, to discuss the recently issued Executive Order supporting safe and responsible development of *unconventional domestic*

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CO39 – Allegheny Defense Project (cont'd)

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natural gas resources. The new Executive Order establishes a deputy-level interagency working group to coordinate policy and to promote sensible, cost-effective approaches. Today's action is a key part of the administration's ongoing commitment to an "all of the above" energy approach. Coordinated efforts to promote development of unconventional domestic natural gas resources enhance our energy security and create jobs. The participants in the meeting represented all components of the value chain – from the exploration and production companies to the manufacturers and other end users. The conversation focused on promoting cross-agency coordination and cost-effective approaches as well as additional opportunities for working together to take full advantage of our natural gas resources – all while also providing communities the confidence that environmental protection and public health will not be compromised.

The White House, Readout of Meeting on Interagency Working Group to Support Safe and Responsible Development of Unconventional Natural Gas, April 13, 2012 (emphasis added). See <http://www.whitehouse.gov/the-press-office/2012/04/13/readout-meeting-interagency-working-group-support-safe-and-responsible-d>.

Thus, it is quite clear that the Obama Administration is aggressively promoting and taking action to facilitate the extraction of shale gas throughout the country, including the Marcellus Shale region. The President has created an interagency working group to promote and facilitate the extraction of shale gas and called for the creation of "sustainable shale gas growth zones" in particular regions. This promotion and facilitation of shale gas extraction constitutes broad Federal action for which an EIS is required. 40 C.F.R. § 1502.4(b).

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B. Prior FERC proceedings, statements, and documents demonstrate that it has long been aware of the regional nature of shale gas development in the Marcellus Shale region and participated in facilitating rapid expansion of Marcellus Shale gas extraction in line with Obama administration policies.

While the Obama administration has been aggressively promoting shale gas, FERC has taken many actions that facilitate the extraction and transportation of shale gas in the Marcellus Shale region. Over the past several years, many FERC proceedings have involved projects related to increasing exploitation of shale gas in the Marcellus Shale region. Additionally, statements by FERC officials as well as FERC documents support the fact that the agency is aware of and is facilitating the exploitation of shale gas in the Marcellus Shale region. The combined effect of this information reveals an agency that is working in concert with the gas industry to specifically target and exploit shale gas in the Marcellus Shale region without taking a hard look at the direct, indirect, and cumulative impacts of the individual projects on the region as a whole.

1. Previous FERC proceedings

Previous FERC proceedings demonstrate that the agency has long been aware of the regional scope of shale extraction in the Marcellus Shale region. For example, in January 2009, FERC issued an order granting authority to AES Sparrows Point LNG to construct and operate a liquefied natural gas (LNG) import terminal in Maryland. *AES Sparrows Point LNG, LLC & Mid-Atlantic Express, LLC*, 126 FERC ¶ 61,019 (2009). In his dissent, former Commissioner Wellinghoff made the following observation:

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See the response to comment CO39-2. The FERC has numerous sources of information (both internal and external) to keep track of the status of the natural gas industry, including projects before the Commission and under consideration by project sponsors. This does not suggest, nor should it be implied, that the FERC is driving this industry or engaged in regional development or planning.

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CO39 – Allegheny Defense Project (cont'd)

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A noteworthy advantage of the Marcellus shale is its proximity to the markets in the Mid-Atlantic and South Atlantic regions. The Marcellus shale extends through much of the Appalachian basin, with the core area running through Pennsylvania and parts of West Virginia, Ohio, and New York. *The effective delivery of Marcellus shale gas could be accomplished with expansion of pipeline and storage infrastructure in the region. For example, Columbia Gas has proposed to expand its storage facilities in Ohio, in part, to facilitate access to increased production in the Appalachian basin.*

Id. at dissent, P 4 (emphasis added). In other words, Commissioner Wellinghoff did not want to approve a LNG terminal to import natural gas when the “effective delivery of Marcellus shale gas could be accomplished with *expansion of pipeline and storage infrastructure in the region.*” Commissioner Wellinghoff even cited a specific project by Columbia Gas to do just that.

Later that year, FERC considered requests for rehearing, clarification, and stay of the January 2009 Order regarding the Sparrows Point LNG Terminal. *AES Sparrows Point LNG, LLC & Mid-Atlantic Express, LLC*, 126 FERC ¶ 61,245 (2009). Commissioner Wellinghoff continued to dissent, stating that:

Several developments over the past year reinforce my concerns about these issues. With respect to other natural gas alternatives[,] improvements in our ability to *produce and deliver gas from shale* has led to a dramatic increase in recoverable domestic gas supply.

Id. at dissent, P 1 (emphasis added). Thus, FERC was well aware of the “dramatic increase” in shale gas in the Marcellus Shale region from at least 2009, if not earlier. Furthermore, at least one Commissioner was on record to deny authorization for the construction and operation of a LNG import terminal since the “effective delivery of *Marcellus shale gas* could be accomplished with *expansion of pipeline and storage infrastructure in the region.*”

Another proceeding in January 2009 demonstrated FERC’s awareness of “domestic supplies such as . . . gas from the *recently developed and soon-to-be developed shale plays*, such as the Barnett and Marcellus areas[.]” *Dominion Cove Point, LNG, LP & Dominion Transmission, Inc.*, 126 FERC ¶ 61,036, at P 20 (2009) (emphasis added). Over the next several years, FERC would review many proposals to expand infrastructure to accommodate increased extraction of gas from the Marcellus Shale, which, in turn, induces more drilling. The following quotes from other proceedings further demonstrates FERC’s awareness and facilitation of shale gas extraction in the Marcellus Shale region:

- Iroquois believes that with the *anticipated development of shale gas production near its interstate pipeline, additional supplies of gas are likely to enter its system, expanding the opportunities for export to Canadian markets. Iroquois Gas Transmission System, L.P.*, 132 FERC ¶ 61,230, P 2 (2010) (emphasis added).
- In addition, because Line N is located in an *area of active Marcellus Shale natural gas production*, National Fuel conducted an open season between August 5 and October 3, 2008, to assess the need for *expanding the capacity of the to-be-relocated Line N. National Fuel Gas Supply Corp.*, 133 FERC ¶ 61,235, P 2 (2010) (emphasis added).
- Anadarko Energy Services Company, a current shipper on the North and South Laterals, filed comments in support of Central NY’s application stating that it will *help develop*

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CO39 – Allegheny Defense Project (cont'd)

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infrastructure and service in the northeast for natural gas from the Marcellus Shale region. Similarly, Chesapeake Energy Marketing, Inc., a shipper that has contracted with Central NY for firm wheeling service, also filed comments in support of the application claiming there is an immediate need for wheeling capacity to enable increasing volumes of Marcellus Shale gas to reach markets. *Central New York Oil and Gas Co., LLC*, 134 FERC ¶ 61,035, P 5 (2011) (emphasis added).

- The proposed facilities, designed to enable a reversal of flow on Empire's system, will permit Empire to receive up to 350,000 Dth per day of Marcellus Shale production in Tioga County, Pennsylvania, and transport that gas to the facilities of TransCanada at the United States-Canadian border at Chippawa. *Empire Pipeline, Inc.*, 135 FERC ¶ 61,163, P 3 (2011) (emphasis added).
- FWS also commented that the cumulative impacts discussion mentions water use and withdrawal but does not provide any data or analysis. Section C of the EA presents a qualitative analysis of potential cumulative impacts of the project with respect to Susquehanna River Basin withdrawals from oil and gas development in the Marcellus Shale region. *Id.* at P 22 (emphasis added).
- However, in view of the continued growth in Appalachian gas supplies and the increasing demand for take-away capacity, Dominion is now proposing to add the capacity necessary to transport the growing supply volumes to an interconnection with Texas Eastern. *Dominion Transmission, Inc.*, 135 FERC ¶ 61,239, P 3 (2011) (emphasis added).
- The first path would bring Gulf Coast, Appalachian, and Rockies supplies to New England and the second would bring Appalachian supplies to New York and New England....Tennessee states that the proposed NSD Project will provide up to an additional 250,000 Dth/d of incremental capacity on its existing pipeline system from the Appalachian supply area to northeast markets. *Tennessee Gas Pipeline Co. & Dominion Transmission, Inc.*, 136 FERC ¶ 61,173, Pp 2; 5 (2011) (emphasis added).
- The Northern Access Project and the Station 230C Project together will enable Marcellus Shale production to be transported north to Canada. National Fuel states that its proposed Northern Access Project is designed to transport 320,000 dekatherms per day (Dth/d) of natural gas on Line X from the Ellisburg Compressor Station to its interconnection with the NSLL at East Aurora, i.e., from south to north....Statoil's motion to intervene included comments supporting the Northern Access Project as being an important addition to the interstate infrastructure serving the Marcellus Shale producing area. *National Fuel Gas Supply Corp. & Tennessee Gas Pipeline Co.*, 137 FERC ¶ 61,054, PP 2; 7 (2011) (emphasis added).

In each of these proceedings, FERC only prepared an EA and in each instance found that its approval would "not constitute major federal action significantly affecting the quality of the human environment."⁴

This demonstrates that FERC's awareness of many companies' plans to increase infrastructure capacity to accommodate and facilitate natural gas extraction in the Marcellus Shale region. Despite similar timing, geography, and the Obama administration's aggressive push for extraction of shale gas in the Marcellus Shale region, the combination of which demonstrates broad Federal action, FERC repeatedly analyzed Marcellus Shale-related projects in EAs and issued findings of no significant impact (FONSI). Had FERC complied with NEPA and looked

⁴ It should also be noted that former Commissioner Wellinghoff, who was on record as supporting the need for "expansion of pipeline and storage infrastructure in the [Marcellus Shale] region," participated in each of the proceedings indented above.

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at these actions cumulatively, FERC could not have reasonably made such findings. That is why FERC must now halt further proceedings on Marcellus Shale-related projects until it prepares a programmatic regional EIS that take a hard look at the direct, indirect, and cumulative impacts of shale gas extraction and transportation.

The following table shows the number of pipeline projects FERC has approved since 2009.

Table 1: FERC Approved Major Pipeline Projects (2009-Present).

Year	Docket No.	Company/Project	Capacity (MMcf/d)	Miles	Issued Date
2009	CP09-68	Texas Eastern Transmission, LP/TEMAX and TIME III Projects	455	62	11/19/09
2009	CP09-237	Transcontinental Gas Pipe Line Co., LLC Delta Lateral Project	208.80	3.4	10/28/09
2009	CP09-18	Dominion Transmission, Inc. Dominion Hub III Project	224.30	9.4	10/06/09
2010	CP10-458	National Fuel Gas Supply Corporation (PF10-1) Line N Compressor Installation Project	150	1.9	12/16/10
2010	CP09-444	Tennessee Gas Pipeline/Line 300 Expansion	350	128.7	05/14/10
2010	CP09-417	Transcontinental Gas Pipe Line Co. LLC Bayonne Delivery Lateral Project	250	0.8	01/08/10
2011	CP11-67	Texas Eastern Transmission, LP (PF10-21) TEAM 2012 Expansion Project	190	17.8	11/17/11
2011	CP10-480	Central New York Oil & Gas Company, LLC	550	39	11/14/11

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		MARC I Project			
2011	CP11-128	National Fuel Gas Supply Corp. (see CP11-133/Tn) Northern Access Expansion Project	320	0	10/20/11
2011	CP11-41	Dominion Transmission, Inc. Ellisburg to Craigs Project (see CP11-30)	150	0.5	09/15/11
2011	CP11-30	Tennessee Gas Pipeline Company Northeast Supply Diversification Project (see CP11-41)	250	6.8	09/15/11
2011	CP11-39	Dominion Transmission Inc. Northeast Expansion Project	200	0	08/24/11
2011	CP11-68	Equitrans, L.P. (PF10-19) Sunrise Project	313.6	47	07/21/11
2011	CP10-448	Dominion Transmission, Inc. (PF09-15) Appalachian Gateway Project	484.3	107.4	06/16/11
2011	CP10-493	Empire Pipeline, Inc. (PF10-5) Tioga County Extension Project	350	16.4	05/19/11
2011	CP10-194	Central New York Oil & Gas Company, LLC	288	0	01/20/11
2012	CP12-72	Dominion Transmission, Inc. (PF11-9) Allegheny Storage Project	125	3.1	12/20/12
2013	CP13-14	Millennium Pipeline Company, LLC (PF12-10) Hancock	225.5	0.1	10/01/13

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		Compressor Project			
2013	CP13-3	Tennessee Gas Pipeline Company Rose Lake Expansion Project	230	0	09/19/13
2013	CP13-13	Dominion Transmission, Inc. Natrium to Market Project	185	0	09/03/13
2013	CP12-20	Dominion Transmission, Inc. Sabinsville to Morrisville Project	92	3.6	03/08/13
2013	CP12-19	Dominion Transmission, Inc. Tioga Expansion Project	270	15.3	03/08/13

Source: <https://www.ferc.gov/industries/gas/indus-act/pipelines/approved-projects.asp>.

Table 1, based on FERC's own records, reveals that between 2009 and 2013, FERC approved 22 projects that involved a combined 463.2 miles of pipelines and a combined capacity of 5,861.5 MMcf/d. As far as we can tell, each of these projects was reviewed in an EA and FERC found that there was no major action significantly affecting the quality of the human environment. Table 2 lists those projects that FERC claims are currently pending:

Table 2: FERC Major Pipeline Projects Pending (Onshore).

Year	Docket No.	Company/Project	Capacity (MMcf/d)	Miles of Pipe	Filing Date
2013	CP13-551	Transcontinental Gas Pipe Line Co., LLC (PF13-5) Leidy Southeast Expansion Project	525	30	09/30/13
2013	CP13-499	Constitution Pipeline Company, LLC (PF12-9) (see Iroquois/CP13-502)	650	122.1	06/13/13
2013	CP13-477	Columbia Gas Transmission,	444	0	05/10/13

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		LLC Smithfield Expansion Project (see CP13-478)			
2013	CP13-132	Transcontinental Gas Pipe Line Company, LLC Northeast Connector Project (see CP13-36)	100	0	04/09/13
2013	CP13-84	Texas Eastern Transmission, LP (PF12-19) TEAM (Tex Eastern Appalachia to Market) 2014	600	33.6	02/27/13
2014	CP14-17	Columbia Gas Transmission, LLC (PF13-7) East Side Expansion Project	312	19	11/01/13
2014	CP14-9	Texas Eastern Transmission, LP Bailey East Mine Panel 1L Project	N/A	0	10/17/13

Source: <https://www.ferc.gov/industries/gas/indus-act/pipelines/pending-projects.asp>.

For the above major pending pipeline projects, only this Project and Transcontinental's Northeast Connector Projects are being analyzed in EISs – the remaining projects are being analyzed in EAs. FERC should halt work on all these projects until it completes a programmatic regional EIS regarding the promotion and facilitation of regional gas extraction and transportation in the Marcellus Shale region.

2. **FERC statements reveal that it is coordinating with industry to rapidly expand natural gas infrastructure in the Marcellus Shale region.**

In November 2011, Oil & Gas Journal reported about a few pipeline projects that FERC had approved that went into service:

Four projects to transport Marcellus shale gas went into service during October as two more were announced, the US Federal Energy Regulatory Commission said on Nov. 14 as its energy projects office released its latest monthly update.

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		LLC Smithfield Expansion Project (see CP13-478)			
2013	CP13-132	Transcontinental Gas Pipe Line Company, LLC Northeast Connector Project (see CP13-36)	100	0	04/09/13
2013	CP13-84	Texas Eastern Transmission, LP (PF12-19) TEAM (Tex Eastern Appalachia to Market) 2014	600	33.6	02/27/13
2014	CP14-17	Columbia Gas Transmission, LLC (PF13-7) East Side Expansion Project	312	19	11/01/13
2014	CP14-9	Texas Eastern Transmission, LP Bailey East Mine Panel 1L Project	N/A	0	10/17/13

Source: <https://www.ferc.gov/industries/gas/indus-act/pipelines/pending-projects.asp>.

For the above major pending pipeline projects, only this Project and Transcontinental's Northeast Connector Projects are being analyzed in EISs – the remaining projects are being analyzed in EAs. FERC should halt work on all these projects until it completes a programmatic regional EIS regarding the promotion and facilitation of regional gas extraction and transportation in the Marcellus Shale region.

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It said National Fuel Gas Co.'s pipeline and storage division placed its *Line N replacement and Lines R and I expansion projects into service on its Line N system in western Pennsylvania*. The projects will provide 150 MMcf of firm *Marcellus shale gas* transportation to Texas Eastern Transmission LP's pipeline in Greene County, Pa., FERC said.

Tennessee Gas Pipeline Co., meanwhile, placed its *Line 300 expansion project into service*, FERC said. The El Paso Corp. subsidiary's system will provide 360 MMcf of firm transportation, include [sic] *Marcellus shale gas*, with increased reliability.

FERC said NFGC and TGP received approval to construct and operate their Northern Access and Station 230C projects, which will provide 320 MMcf of transportation capacity for *Marcellus shale gas in Pennsylvania and New York*.

The report also mentioned two projects *outside the US Northeast shale gas region*.

Snow, Nick. FERC reports on Marcellus shale gas transportation projects, Oil & Gas Journal, Nov. 14, 2011 (emphasis added). See <http://www.ogj.com/articles/2011/11/ferc-reports-on-marcellus-shale-gas-transportation-projects.html>. This is important because it demonstrates that the industry, like FERC, views shale gas extraction and transportation by region. FERC is facilitating rapid expansion of pipeline and storage capacity in the Marcellus Shale region.

On February 16, 2012, Commissioner John N. Norris released a statement regarding standards for business practices for interstate natural gas pipeline, stating:

The interdependency of the electricity and natural gas industries is increasing as we rely more and more on natural gas to fuel our power generation fleet. In fact, the electric generation market is rapidly becoming the largest customer segment served by the natural gas industry. As a result of this increasing interdependence, it is imperative that both industries, along with policymakers and regulators, determine what steps need to be taken to increase coordination and harmonization in their operations and practices ...

We are on what will likely be a multi-year journey to ensure that the natural gas and electric industries are coordinated and harmonized in a manner that ensures that consumers continue to receive reliable and efficient energy services.

FERC, Commissioner John R. Norris Statement, February 16, 2012, Docket No. RM96-1-037, Item No. G-1, Standards for Business Practices for Interstate Natural Gas Pipelines (emphasis added). See <http://www.ferc.gov/media/statements-speeches/norris/2012/02-16-12-norris-G-1.asp>.

On the same day, Commissioner Cheryl A. LaFleur stated:

As my colleagues have mentioned, the electric industry's increased reliance on natural gas has greatly heightened the need to address how these markets and operating networks can better work together ...

In particular, I would like to highlight five aspects of gas and electric interdependence that I believe should be considered, and on which I would appreciate receiving comments. The first,

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most relevant to today's rulemaking, is coordination and communication between the gas and electric industry to maintain reliability during weather and outage events. Second, I would welcome comments on new pipeline and storage service and pricing structures that might better meet the emerging needs of generators. The third area is scheduling protocols for gas pipelines and electric generation facilities. The fourth area is electric reliability standards, and whether there is a need to include standards about fuel supply to support reliability. Finally, I invite comments on how we can improve the Commission's work on pipeline and storage infrastructure to ensure that the gas infrastructure is in place to support the nation's growing reliance on gas for generation ...

Today, New England is even more dependent on gas than it was in 2004, and has ongoing challenges to ensure adequate future gas infrastructure.

FERC, Commissioner Cheryl A. LaFleur Statement, February 16, 2012, Docket No. RM96-1-037, Item No. G-1, Standards for Business Practices for Interstate Natural Gas Pipelines (emphasis added). See <http://www.ferc.gov/media/statements-speeches/laflaur/2012/02-16-12-laflaur-G-1.asp>. Commissioner Norris stated that FERC is on a "multi-year journey to ensure that the natural gas and electric industries are coordinated and harmonized." Commissioner LaFleur stated the need to "ensure that gas [pipeline and storage] infrastructure is in place to support the nation's growing reliance on gas for generation." This demonstrates FERC's broad Federal action to programmatically expand natural gas infrastructure in the Marcellus Shale region. Indeed, Commissioner LaFleur indicates the need to do so to since "New England is even more dependent on gas than it was in 2004, and has ongoing challenges to ensure adequate future gas infrastructure." Over the last several years, FERC has been assisting the natural gas industry, in piecemeal projects, to "ensure that the gas infrastructure is in place" rather than looking at the Obama administration's and FERC's programmatic campaign at the regional level in an EIS.

3. Other FERC documents demonstrate the regional scope of its approach to reviewing projects in the Marcellus Shale region.

In addition to previous FERC proceedings and statements, other FERC documentation reveals its broad Federal action to promote and facilitate the expansion of shale gas from the Marcellus Shale region. For example, in September 2010, FERC produced a presentation for the Penn State Cooperative Extension Program titled "Natural Gas Pipelines – Understanding the Infrastructure Development." On pages 27-28 of the presentation, FERC provided the following information:

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FERC Process for Siting Natural Gas Infrastructure

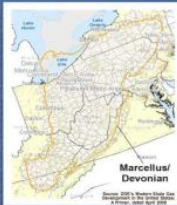
September 2010

Why Gas? Why Now?

- Projects in Pennsylvania
- Project drivers
 - Market
 - Supply

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Marcellus Shale in the Appalachian Basin



- Spans 6 states in the northeastern U.S.; covers 95,000 square miles
- Amount of gas in place is estimated to be up to 1,500 Tcf
- Recoverable resources estimated to be 282 Tcf
- Thickness ranges from 50 ft to 200 ft
- As of 10/08, a total of 518 wells permitted in PA; 277 drilled
- Depth of production from 4,000 ft to 8,500 ft
- Average well spacing is 40 to 160 acres

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Penn State Extension Program, Natural Gas Pipelines--
Understanding Infrastructure Development

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Federal Energy Regulatory Commission Process for Siting Natural Gas Infrastructure. Penn State Cooperative Extension Program. Natural Gas Pipelines – Understanding the Infrastructure Development. pp. 27-28. Sept. 8-9, 2010. (Attachment 1). See <http://extension.psu.edu/natural->

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resources/natural-gas/presentations/FERCPipelinePresentation9-9-10.pdf. In other words, in September 2010, FERC was presenting information to Penn State stating that “projects in Pennsylvania” were part of the reason that natural gas was a major focus of FERC in the region. Moreover, FERC included a map depicting “Marcellus Shale in the Appalachian Basin” noting that it includes “6 states in the northeastern U.S.” *Id.* at 28. This clearly shows that FERC was aware of the regional scope of pipeline infrastructure related to extraction of shale gas in the Marcellus Shale region.

FERC also included the following map of “approved,” “pending,” and “potential” natural gas projects in Pennsylvania:

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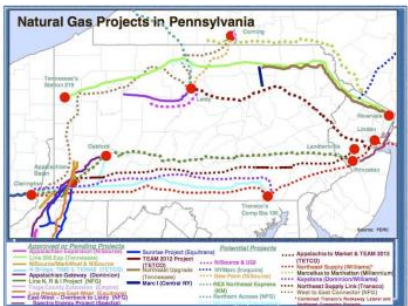
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FERC Process for Siting Natural Gas Infrastructure

September 2010



Penn State Extension Program, Natural Gas Pipelines--
Understanding Infrastructure Development

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Id. at 29. This shows that in September 2010, FERC was aware of at least 14 approved or pending natural gas projects and 11 potential natural gas projects. This map clearly demonstrates the interconnectedness of all of these projects. The need for a programmatic regional EIS was

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self-evident in September 2010, yet FERC continues processing applications as though there has never been even a hint of a regional plan to exploit shale gas resources in the Marcellus Shale region. That must end now and FERC must prepare a programmatic regional EIS for the Marcellus Shale region.

In March 2014, FERC published its “Strategic Plan” for Fiscal Years 2014-2018, in which it identifies a specific objective “to foster economic and environmental benefits for the nation through approval of natural gas and hydropower projects.”⁵ Federal Energy Regulatory Commission, Strategic Plan, FY 2014-2018, Objective 2.1, at 17 (Mar. 2014) (emphasis added). See <https://www.ferc.gov/about/strat-docs/FY-2014-FY-2018-strat-plan.pdf>. Specifically, the Strategic Plan states that:

Demand for natural gas in the United States is at its highest levels on record, and natural gas production continues to increase due to the development of shale gas. Among its many uses, natural gas is a substantial and growing resource for electric power generation, in part due to the current low price of natural gas. The responsible development of interstate natural gas infrastructure – pipelines, storage, and LNG facilities – is a critical link to ensuring that natural gas supply can reach market areas.

Id. (emphasis added). Thus, it is a declared objective of FERC’s “Strategic Plan” to foster the construction and expansion of natural gas infrastructure. Or, to put it another way, FERC is actively promoting the growth and development of natural gas infrastructure in the Marcellus Shale region. That objective can be visualized in the following document produced by FERC’s Office of Energy Projects:

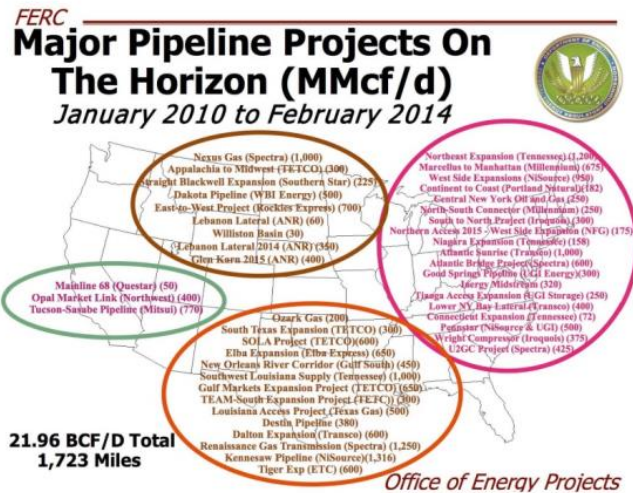
⁵ “Foster” means “to promote the growth or development of: encourage.” Merriam-Webster.

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Source: FERC, Office of Energy Projects, Major Pipeline Projects on the Horizon (MMcf/d) January 2010 to February 2014. (Attachment 2) See <https://www.ferc.gov/industries/gas/industry-act/pipelines/horizon-pipe.pdf>.

This document reveals a few things. First, it underscores that FERC views these pipeline projects as “major pipeline projects.” If all of these pipeline projects are “major” projects, it creates a presumption that the implementation of these projects, either individually or cumulatively, constitutes major federal action that may significantly impact our environment. As such, at a minimum FERC should be analyzing each of these projects in an EIS.

Second, it demonstrates that FERC considers the scope of these “major pipeline projects” at both a national and a regional level. FERC segregated these “major pipeline projects” using different colored circles and typeface to differentiate between the projects on a regional level. Many, if not most or all, of the “major pipeline projects” in the northeastern circle are likely related to shale gas extraction in the Marcellus Shale region.

Third, it demonstrates that FERC *does* look at capacity and miles of pipeline cumulatively in one document for its own information purposes. FERC must explain why this is not done through the NEPA process so that the public has a sense of the full scale of impacts from pipeline construction on a regional level before it occurs rather than getting piecemeal EAs that

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cont'd | repeatedly find no significant impacts or a few site-specific EISs that are still far too narrow in terms of analyzing cumulative impacts.

CO39-5 | **C. Other documents and statements demonstrate there is a regional plan of development of shale gas in the Marcellus Shale region.**

In addition to the Obama administration and FERC's policies, proceedings, documents, and statements demonstrating a regional plan to expand infrastructure for shale gas extraction in the Marcellus Shale region, documents and statements from the gas industry similarly demonstrate such a regional plan of development. Also, other documents from academia demonstrate there is a regional plan of development. As such, FERC must prepare a programmatic regional EIS before any more projects, including the underlying projects, are approved.

1. Gas industry documents reveal there is a regional plan of development of shale gas in the Marcellus Shale region.

Documents produced by the gas industry demonstrate that it has regional plans of development of shale gas in the Marcellus Shale region to expand pipeline capacity and transport gas to market, particularly in the northeast and New England. For example, Tennessee Gas Pipeline Company, in addition to other pending and recently approved projects, is "developing its Northeast Expansion Project[.]" Kinder Morgan, Natural Gas Pipelines, Northeast Expansion Project Open Season. See http://www.kindermorgan.com/business/gas_pipelines/east/neupopenseason/. According to Kinder Morgan's website:

With Tennessee's ability to expand its system to provide significant volumes at competitive rates, the [Northeast Expansion] Project is of sufficient scale to address the long-term energy needs of New England and Atlantic Canada by providing access to *abundant new supplies from the Marcellus and Utica supply areas*.

Id. (emphasis added). The website also refers to the Marcellus and Utica shale as "abundant new regional supplies." *Id.* (emphasis added). A map at this same webpage further demonstrates the regional nature of shale gas extraction and transportation:

CO39-5 | The FERC staff reviews applications for interstate natural gas pipeline projects in accordance with an applicant's stated objective(s) in order to disclose the environmental impacts of a proposal to inform the decision makers and, in accordance with NEPA, evaluate reasonable alternatives to a project. These applications are not limited to only those transporting gas extracted from either the Marcellus or Utica Shales. The gas industry contemplates projects on an individual basis. As markets develop and a supply is available it considers whether they are financially viable. The Commission does not consult with the industry to develop project planning on a regional level.

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Source: Kinder Morgan, Northeast Expansion Project Map. (Attachment 3). See http://www.kindermorgan.com/business/gas_pipelines/east/neupopenseason/ProjectMap.pdf.

This map appears to show shale gas coming from the “Marcellus and Utica Supply” region, through the proposed Constitution Pipeline and Iroquois’ Wright Interconnect, and transported through the proposed Northeast Expansion Project pipeline. That demonstrates that Tennessee’s Northeast Expansion Project is a connected, similar, and cumulative action to the Constitution and Wright Interconnect Projects at issue here and must be considered in the same site-specific EIS (in addition to the need for a regional programmatic EIS that must be completed first). The map also appears to show some of that shale gas being transported south along Tennessee’s 300 Line, which recently went into service. According to Kinder Morgan’s website:

Tennessee Gas Pipeline Company (Tennessee) has increased the capacity of its 300 Line to transport new diversified natural gas supplies, including newly accessed Appalachian and Marcellus shale gas to serve the growing demand for interstate natural gas transmission service in the northeastern United States. Through its 300 Line Project, Tennessee installed seven looping segments in Pennsylvania and New Jersey totaling approximately 127 miles of 30-inch pipeline, and added approximately 55,000 horsepower following the installation of two new compressor stations and upgrades at seven existing compressor stations.

The company constructed the additional HP at two new compressor stations located in northwestern Pennsylvania, at two existing compressor stations in Pennsylvania, and at an existing compressor station in New Jersey. Tennessee also upgraded or restaged compressors at three existing stations. In addition, to capture efficiencies and increase reliability, Tennessee replaced the horsepower at four of the previously mentioned existing compressor stations.

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cont'd Kinder Morgan, Natural Gas Pipelines, Tennessee Gas Pipeline – 300 Line. *See* http://www.kindermorgan.com/business/gas_pipelines/east/TGP/300Line/. This demonstrates that Tennessee has taken significant steps to increase its capacity all over the Marcellus Shale region.

According to Columbia Pipeline Group's website on the West Side Expansion Project:

As a result of the continued and projected growth in Marcellus and Utica production, Northeast gas supply is projected to outgrow demand by the end of the decade. Pipeline capacity in the region is constrained creating the need for new infrastructure, and producers need a path out of the region to avoid continued basis erosion.

Columbia Pipeline Group. West Side Expansion Project – Overview (emphasis added). *See* <https://www.columbiapipelinegroup.com/current-projects/west-side-expansion-project>.

CPC's application for the underlying Project also demonstrates that it is part of this regional plan of shale gas extraction and transportation:

North Central Pennsylvania is experiencing a dramatic increase in natural gas production, primarily from the development of shale gas...Constitution's natural gas pipeline system is well-positioned to transport North Central Pennsylvania production to major, high-demand markets, including New York and New England.

Notice of Application, p. 16 (emphasis added). The gas industry has embarked on a regional plan to exploit shale gas in the Marcellus Shale region. FERC must therefore examine the environmental consequences of that exploitation and associated infrastructure development and expansion in a programmatic regional EIS.

2. Other evidence of a regional plan of development for natural gas infrastructure expansion in the Marcellus Shale region.

According to a 2012 article in Bloomberg News:

Natural gas pipelines coming into service by year end may boost deliveries from the Marcellus shale deposit in the U.S. Northeast by 30 percent, extending a supply glut that helped send prices to decade lows.

As much as 2 billion cubic feet of gas a day are set to flow from the lines in Pennsylvania, Ohio and West Virginia, bound for markets along the Eastern Seaboard, based on government and pipeline-company projections. About 1,000 Marcellus shale wells sit uncompleted, mainly because of a lack of pipeline infrastructure, according to the Energy Department.

Naureen S. Malik, Bloomberg News, Natural Gas Pipelines to Expand U.S. Supply Glut: Energy Markets. Sept. 26, 2012. (emphasis added). *See* <http://www.businessweek.com/news/2012-09-26/natural-gas-pipelines-to-expand-u-dot-s-dot-supply-glut-energy-markets>. In other words, according the Department of Energy, unless pipeline infrastructure is increased, about 1,000 Marcellus shale wells will not be completed. This demonstrates the interconnectedness of the

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extraction side and the transport side and the need to consider the environmental impacts of both in a programmatic regional EIS.

In February 2014, the Energy Information Administration (EIA) published a report on gas deliveries to New England. According to the report, one of the "potential solutions" to "lessen the impact of limited peak supply at peak demand times" is the expansion of pipeline infrastructure and capacity:

With rising natural gas output from the Marcellus production field, pipeline expansion to move this gas to New England is one option for alleviating market stress...Companies have proposed pipeline expansion, but getting the financial commitments to move forward has been difficult because the additional capacity may only be necessary for short periods during the year. Pipeline expansion may become more viable if baseload consumption of natural gas to generate electricity continues to increase.

Energy Information Administration, Natural Gas, Issues and Trends: Natural Gas, High Prices show stresses in New England natural gas delivery system. Feb. 7, 2014. (emphasis added). See <http://www.eia.gov/naturalgas/issuesandtrends/deliverysystem/2013/>.

Of course, "baseload consumption of natural gas to generate electricity" is likely to increase since it is one of FERC's primary goals. As stated above, Commissioner Norris stated in 2012 that:

We are on what will likely be a multi-year journey to ensure that the natural gas and electric industries are coordinated and harmonized in a manner that ensures that consumers continue to receive reliable and efficient energy services.

FERC, Commissioner John R. Norris Statement, February 16, 2012, Docket No. RM96-1-037, Item No. G-1, Standards for Business Practices for Interstate Natural Gas Pipelines (emphasis added). See <http://www.ferc.gov/media/statements-speeches/norris/2012/02-16-12-norris-G-1.asp>. Also in 2012, Commissioner LaFleur questioned:

how we can improve the Commission's work on pipeline and storage infrastructure to ensure that the gas infrastructure is in place to support the nation's growing reliance on gas for electric generation ...

FERC, Commissioner Cheryl A. LaFleur Statement, February 16, 2012, Docket No. RM96-1-037, Item No. G-1, Standards for Business Practices for Interstate Natural Gas Pipelines (emphasis added). See <http://www.ferc.gov/media/statements-speeches/laflaur/2012/02-16-12-laflaur-G-1.asp>.

Thus, it is clear that FERC is actively seeking to foster more of a reliance on natural gas for electric generation that EIA believes is critical to the expansion of pipelines for purposes of alleviating market stress. Again, as FERC's Strategic Plan for 2014-2018 states:

Demand for natural gas in the United States is at its highest levels on record, and natural gas production continues to increase due to the development of shale gas. Among its many uses, natural gas is a substantial and growing resource for electric power generation, in part due to the

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current low price of natural gas. *The responsible development of interstate natural gas infrastructure – pipelines, storage, and LNG facilities – is a critical link to ensuring that natural gas supply can reach market areas.*

FERC cannot ignore the interconnectedness revealed by its own documents and statements as well as the documents and statements of the current Administration, other federal agencies, and the gas industry itself. Therefore, FERC must prepare a programmatic regional EIS.

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III. Exploitation of shale gas resources in the Marcellus Shale region are already causing substantial impacts to Pennsylvania's forests, wildlife habitat, water and air quality, and recreation opportunities.

Since 2005, when the first Marcellus Shale well was drilled in Pennsylvania, the industry has drilled thousands of new shale gas wells. Neither the state nor the federal government has adequately considered the long-term environmental damage of such a boom in extraction activities across the Commonwealth. FERC must now take a hard look at the realities of this landscape level regional development and halt all site-specific projects until there is a programmatic regional EIS completed.

A. Habitat Fragmentation and Wildlife Impacts

To understand how shale gas extraction in the Marcellus Shale region has already impacted Pennsylvania, it is important to look at Pennsylvania Department of Environmental Protection figures regarding the number of permits issued and wells drilled. For example, over the 5-year period of 2003-2007, a total of 375 shale gas wells were permitted in Pennsylvania. John A. Harper, *The Marcellus Shale – An Old "New" Gas Reservoir in Pennsylvania*, Pennsylvania Geology, Vol. 38, No. 1. Pennsylvania Bureau of Topographic and Geologic Survey. p. 9. (Spring 2008). See <http://www.marcellus.psu.edu/resources/PDFs/pageologydcnr.pdf>. Since 2009, however, shale gas drilling has dramatically increased throughout Pennsylvania, as Table 3 demonstrates.

Table 3: Unconventional Shale Gas Wells Permitted & Drilled in Pennsylvania, 2009-2013.⁶

Year	Permits Issued	Wells Drilled
2009	1,984	763
2010	3,314	1,454
2011	3,512	1,937
2012*	2,246	961
2013	2,965	1,207
Total	14,021	6,322

Source: Pennsylvania Department of Environmental Protection. Permits Issued-Wells Drilled Maps. See http://www.portal.state.pa.us/portal/server.pt/community/marcellus_shale/20296. *In 2012, the DEP only has data for January – August. Thus, the figures for both permits issued and wells drilled are almost certainly higher than the total figures.

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As stated in section 4.13.1.1 of the EIS, development of the Marcellus Shale natural gas resource is not the subject of the EIS. Production and gathering activities, and the pipelines and facilities used for these activities, are not regulated by the FERC but are overseen by the affected region's state and local agencies with jurisdiction over the management and extraction of the Marcellus Shale gas resource. The FERC's jurisdiction is further restricted to facilities used for the transportation of natural gas in interstate commerce, and does not extend to facilities used for intrastate transportation.

The increase of bobcats in New York is noted. See the response to comment FA4-9 regarding invasive species. Although the EIS does not specifically discuss the hemlock wooly adelgid, section 4.5.4 of the EIS does discuss invasive species such as the emerald ash borer and didymo.

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Thus, by 2011, the Pennsylvania Department of Environmental Protection (DEP) was issuing shale gas permits at an *annual* rate that was nearly 10 times higher than the 5-year rate from 2003-2007. In 2013, the permit issuance rate was nearly 8 times the 2003-2007 time period. The rate of permits issued from 2009-2013 is over *37 times higher* than the rate during from 2003-2007. This rate of permit issuance is at least partly related to FERC's aggressive actions to expand capacity throughout the Marcellus Shale region.

While the DEP and FERC have been facilitating the gas industry's proliferation across Pennsylvania, the U.S. Geological Survey (USGS) has documented the real world consequences of that facilitation. In 2012 and 2013, the USGS published seven reports regarding "Landscape Consequences of Natural Gas Extraction" in 14 Pennsylvania Counties. See E.T. Slonecker et al., 2012, Landscape consequences of natural gas extraction in Bradford and Washington Counties, Pennsylvania, 2004-2010: U.S. Geological Survey Open-File Report 2012-1154; E.T. Slonecker et al., 2012, Landscape Consequences of Natural Gas Extraction in Greene and Tioga Counties, Pennsylvania, 2004-2010: USGS Open-File Report 2012-1220; E.T. Slonecker et al., 2013, Landscape Consequences of Natural Gas Extraction in Allegheny and Susquehanna Counties, Pennsylvania, 2004-2010: USGS Open-File Report 2013-1025; E.T. Slonecker et al., 2013, Landscape Consequences of Natural Gas Extraction in Fayette and Lycoming Counties, Pennsylvania, 2004-2010: USGS Open-File Report 2013-1119; L.E. Milheim et al., 2013, Landscape Consequences of Natural Gas Extraction in Somerset and Westmoreland Counties, Pennsylvania, 2004-2010: USGS Open-File Report 2013-1126; L.E. Milheim et al., 2013, Landscape Consequences of Natural Gas Extraction in Lackawanna and Wayne Counties, Pennsylvania, 2004-2010: USGS Open-File Report 2013-1227; C.M. Roig-Silva et al., 2013, Landscape Consequences of Natural Gas Extraction in Beaver and Butler Counties, Pennsylvania, 2004-2010: USGS Open-File Report 2013-1226; L.E. Milheim et al., 2013, Landscape Consequences of Natural Gas Extraction in Armstrong and Indiana Counties, Pennsylvania, 2004-2010: USGS Open-File Report 2013-1263; E.T. Slonecker et al., Landscape Consequences of Natural Gas Extraction in Sullivan and Wyoming Counties, Pennsylvania, 2004-2010: USGS Open-File Report 2013-1261. *All reports available at* http://pubs.er.usgs.gov/#search:advance/page=1/page_size=100/advance=undefined/page_size=100/query=landscape%20consequences%20of%20natural%20gas%200.

The report for Allegheny and Susquehanna Counties is particularly relevant here since the project area includes Susquehanna County. That report stated:

The overall landscape effects of natural gas development *have been considerable*. Over 9,600 Marcellus Shale gas drilling permits and over 49,500 non-Marcellus Shale permits have been issued from 2000 to 2011 in Pennsylvania ([DEP], 2011). ... [w]ith all of the development of natural gas wells in the Marcellus Shale, it is only part of the overall natural gas story in this area...[Conventional natural gas wells are] commonly located in the same general area as the Marcellus Shale. The [conventional] wells are much shallower and less productive and are often located in clusters that cover large areas of the landscape with nearly 60,000 total gas wells established. Both types of well may affect a given area. With the accompanying areas of disturbance, well pads, new roads, and pipelines from both types of natural gas wells, *the effect on the landscape is often dramatic*. Figure 2 shows a pattern of landscape change from forest to forest interspersed with gas extraction infrastructure. These landscape effects have consequences for the ecosystems, wildlife, and human populations that are collocated with natural gas extraction activities.

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E.T. Slonecker et al., 2013, Landscape consequences of natural gas extraction in Allegheny and Susquehanna Counties, Pennsylvania, 2004-2010: USGS Open-File Report 2013-1025, pp. 2-3 (emphasis added) (Attachment 4).⁷ Each of the other six reports contains similar language about the already existing impacts caused to Pennsylvania's landscape due to shale gas extraction and transportation infrastructure. In many cases, pipelines were specifically identified as the greatest contributor to forest fragmentation.

For example, the USGS report on Allegheny and Susquehanna Counties stated that "forests became more fragmented due to natural gas resource development" and that in Susquehanna County, most of that fragmentation was "attributable to pipeline construction." *Id.* at 23. Additionally, the report found that "Marcellus site development and pipeline construction were the major contributors to forest loss" in Susquehanna County. *Id.* at 26. FERC must include these reports in the record and explain how, in light of USGS's remarks about the effects that shale gas extraction and transportation in the Marcellus Shale region in general, and Susquehanna County in particular, the underlying projects and other connected, similar, and cumulative actions, are not causing significant and long-term damage to our forests and watersheds, including habitat that is critical to wildlife.

The need for FERC to prepare a programmatic regional EIS is also supported by the U.S. Fish and Wildlife Service's (USFWS) recent listing of the rayed bean, snuffbox, and sheepsnose mussels as "endangered" under the Endangered Species Act (ESA). 77 FR 8,632 (Feb. 14, 2012); 77 FR 14,914 (Mar. 13, 2012). All three species have existing populations in the Allegheny River. 77 FR at 8,643 (Feb. 14, 2012); 77 FR at 14,926 (Mar. 13, 2012). The listing determination for the rayed bean and snuffbox mussels stated:

One issue of particular concern is the increase in natural gas extraction from the Marcellus Shale Formation...In order to extract the natural gas from the shale, large volumes of water are needed to drill and hydraulically fracture the rock. After the drilling and fracturing are completed, the water must be removed from the well before the gas can flow. Extensive water withdrawals associated with the Marcellus Shale can dewater mussel beds and reduce habitat suitability (Douglas 2010, pers. comm.). Concerns about the availability of water supplies needed for gas production and questions about wastewater disposal have been raised by water-resource agencies and citizens throughout the Marcellus Shale gas development region (Soeder and Kappel 2009, pp. 3-4).

Below the Marcellus Shale lies the Utica Shale, which also holds a significant amount of natural gas (<http://geology.com> 2011). The Utica Shale is thicker than the Marcellus, it is more geographically extensive, and it has already proven its ability to support commercial production (<http://geology.com> 2011)...Natural gas extraction in the Marcellus and Utica Shales has the potential to negatively impact rayed bean and snuffbox populations throughout New York, Pennsylvania, West Virginia, eastern Ohio, and Ontario, Canada.

⁷ The report stated "coalbed methane" wells instead of "conventional gas" wells. We believe this was a typo and the USGS intended "conventional gas" wells. This is supported by the other reports, which contain similar language but use "conventional gas" wells rather than "coalbed methane" wells. We also believe the "60,000" figure refers to conventional rather than coalbed methane wells.

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77 FR at 8,656 (Feb. 14, 2012) (emphasis added). The listing determination for the sheepsnose mussel also noted the threats posed by exploitation of both the Marcellus and Utica shale formations:

Coal, oil, and natural gas resources are present in some of the watersheds that are known to support sheepsnose, including the Allegheny River. Exploration and extraction of these energy resources can result in increased siltation, a changed hydrograph, and altered water quality even at a distance from the mine or well field. Sheepsnose habitat in larger streams can be threatened by the cumulative effects of multiple mines and well fields (adapted from Service 2008, p. 11).

Coal, oil, and gas resources are present in a number of the basins where sheepsnose occur, and extraction of these resources has increased dramatically in recent years, particularly in Pennsylvania and West Virginia. Although oil and gas extraction generally occurs away from the river, extensive road networks are required to construct and maintain wells. These road networks frequently cross or occur near tributaries, contributing sediment to the receiving waterway. In addition, the construction and operation of wells may result in the discharge of brine. Point-source discharges are typically regulated; however, nonpoint inputs such as silt and other contaminants may not be sufficiently regulated, particularly those originating some distance from a waterway. In 2006, more than 3,700 permits were issued for oil and gas wells by the [PA-DEP], which also issued 98 citations for permit violations at 54 wells (Hopey 2007; adapted from Service 2008, p. 12).

Recent advances in drilling technology and rising natural gas prices have attracted new interest in the natural gas held in the Marcellus Shale rock formation that underlies approximately two-thirds of Pennsylvania and portions of the States of New York and West Virginia (PA DEP 2010, p. 1). Similarly, the Utica Shale rock formation, which underlies the Marcellus Shale in many locations, may also be mined for natural gas in the foreseeable future (Bier 2011, pers. comm.; Urban 2011, pers. comm.). The hydraulic fracturing process of Marcellus Shale natural gas extraction typically requires about one million gallons of water for a vertical well to approximately 5 million gallons of water for a vertical well with a horizontal lateral (PA DEP 2010, p. 1). The used water, often referred to as "frac returns" must be reused in the next well or sent to an approved treatment facility before it is discharged into natural waterways. In Pennsylvania, there are currently few treatment facilities capable of treating Marcellus Shale frac returns fluids, which may have high total dissolved salts, particularly chlorides (Urban 2011, pers. comm.). In addition, *infrastructure development associated with Marcellus Shale industry*, such as dirt and gravel roads and *pipeline construction*, may increase sedimentation in rivers (Bier 2011, pers. comm.; Urban 2011, pers. comm.)

77 FR at 14,938-14,939 (Mar. 13, 2012) (emphasis added). FERC's approval of the Projects (and other connected, similar, and cumulative projects) could impact these endangered species. FERC has an affirmative duty "to conserve endangered species and threatened species and shall utilize their authorities in furtherance of the purposes of [the Endangered Species Act]." 16 U.S.C. § 1531(c)(1). See also 16 U.S.C. § 1536(a)(1) ("...Federal agencies shall, in consultation with and with the assistance of the Secretary, utilize their authorities in furtherance of the purposes of this chapter by carrying out programs for the conservation of endangered species and threatened species").

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FERC must enter into formal consultation with USFWS to determine whether its authorization of the Projects (and other connected, similar, and cumulative projects) in the Marcellus Shale region would jeopardize these species. 16 U.S.C. § 1536(a)(2).

FERC must also examine whether shale gas extraction and pipeline construction activities are impacting other wildlife species on a regional level. For example, in 2012, the New York Department of Environmental Conservation (DEC) revised its management plan for bobcats. According to the plan:

Observations by hunters and trappers, and reports from the general public suggest that bobcat populations are increasing and expanding throughout New York State outside of their historic core range in the Taconic, Catskill, and Adirondack mountains and into central and western New York. *In addition, emigration of bobcats from Pennsylvania has likely fostered growth of the bobcat population in the southern tier of the state* (Matt Lovallo, Pennsylvania Game Commission, personal communication).

New York Department of Environmental Conservation. Management Plan for Bobcat in New York State 2012-2017. p. 8. 2012 (emphasis added). (Attachment 5). See http://www.dec.ny.gov/docs/wildlife_pdf/finalbmp2012.pdf. The plan also stated that:

The presence of bobcat in New York's Southern Tier has increased dramatically over the past decade. What began as occasional sightings along the New York/Pennsylvania border has progressed to large numbers of observations, trail camera photos, and incidental captures and releases by trappers. *Over the past five years there have been 332 bobcat observations documented in the harvest expansion area* (Figure 4).

Id. at 17 (emphasis added). Figure 4 of the plan is a map of New York showing all of the confirmed bobcat observations. There is a concentration of observations along the Pennsylvania border. FERC must analyze whether shale gas extraction and transportation activities are causing bobcats to migrate to New York. After all, as FERC acknowledges in the DEIS, for much of the time that the DEC was documenting a sudden increase in bobcat populations along the Pennsylvania border, New York had a moratorium on shale gas extraction. DEIS, p. 4-204 (Table 4.13-1). Pennsylvania, on the other hand, has, like FERC, aggressively promoted and facilitated the extraction and transportation of shale gas. While the DEC was documenting an increase in bobcat observations along the Pennsylvania border between 2006-2011, the following table reveals how many oil and gas wells (including shale gas wells) were drilled in North Central Pennsylvania counties:

Table 4: Oil and gas wells approved in 9 Pennsylvania Counties (including shale gas wells).

	Year						
	2005	2006	2007	2008	2009	2010	2011
PA County							
McKean	694 (0)	352 (1)	363 (1)	443 (4)	254 (7)	221 (20)	258 (17)
Potter	25 (0)	49 (1)	40 (7)	97 (4)	22 (7)	56 (34)	20 (16)
Tioga	0	5 (1)	0	13 (12)	117 (117)	274 (272)	268 (260)
Bradford	5 (0)	2 (2)	3 (0)	27 (25)	147 (145)	406 (398)	423 (423)

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Susquehanna	0	1 (1)	2 (2)	34 (34)	90 (89)	111 (111)	221 (220)
Elk	72 (1)	70 (1)	100 (4)	90 (6)	49 (4)	85 (13)	53 (21)
Cameron	0	0	2 (0)	2 (2)	3 (3)	5 (4)	7 (7)
Clinton	20 (0)	10 (0)	13 (0)	18 (4)	11 (9)	34 (33)	35 (35)
Lycoming	0	0	5 (5)	14 (11)	24 (23)	116 (116)	294 (294)

Source: PADEP
http://www.depreportingservices.state.pa.us/ReportServer/Pages/ReportViewer.aspx?/Oil_Gas/Wells_Drilled_By_County. Note: The first figure in each cell reveals the total number of oil and gas wells drilled in that county for a particular year. The second figure, denoted by (), reveals that portion of the total number that are Marcellus Shale gas wells. For example, 406 oil and gas wells were drilled in Bradford County in 2010, 398 of which were Marcellus Shale gas wells).

This demonstrates that while Pennsylvania was approving record numbers of shale gas wells (in addition to conventional oil and gas wells) across the northern tier of the state, bobcats were suddenly showing up in record numbers in the southern tier of New York, where there was a moratorium on shale gas drilling. FERC must explore whether this was a result of shale gas drilling and how further authorizations impact bobcats and other wildlife species.

Finally, FERC must also consider how the Projects (and other connected, similar, and cumulative projects) are facilitating the spread of invasive species such as Hemlock Woolly Adelgid. Our review of the DEIS found no reference to the potential for increased spread of the HWA. FERC must take a hard look at the potential for exacerbating the spread of HWA by approving the Projects. Furthermore, FERC must consider this and other impacts in a programmatic regional EIS.

CO39-7

B. FERC must consider and analyze impacts to the Allegheny National Forest.

FERC must take a hard look at the ramifications of approving the Project (and other connected, similar, and cumulative projects) on the Allegheny National Forest (ANF). As of March 2013, there were 15 shale gas wells in the ANF from 10 well pads. USFS FOIA response, p. 4 (Apr. 16, 2013) (Attachment 6). While this may seem like a small number, especially when compared to other parts of Pennsylvania where thousands of shale gas wells have been drilled over the last few years, the ANF already has thousands of shallow oil and gas wells. FERC must consider how its approval of the Project (and other projects) will exacerbate impacts to the ANF's wildlife habitat, water and air quality, and recreation opportunities.

According to a recent FOIA response from the U.S. Forest Service, there are at least 12,006 oil and gas wells in the ANF. USFS FOIA response, p. 1 (Attachment 7). That represents more than 70% of the oil and gas wells in the entire National Forest System. When one considers that the ANF contains just 0.002% of the land in the National Forest System, that figure is astounding and represents a complete failure on the part of the Federal and state governments to protect the public's land. Forest Service documents and officials reveal how much existing oil and gas drilling has already significantly damaged Pennsylvania's only national forest.

1. Oil and gas drilling has already substantially impacted public recreation and increased shale gas extraction from the Marcellus Shale will undoubtedly exacerbate those impacts.

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The Allegheny National Forest is located more than 100 miles from the proposed projects. Therefore impacts on the Allegheny National Forest from the proposed projects are not expected. Any gas production occurring within the Allegheny National Forest would be subject to the approval and review of the U.S. Forest Service. The FERC has no obligation, nor the authority, to compel the U.S. Forest Service to manage forest lands under its jurisdiction in any manner. The U.S. Forest Service is bound by the laws governing its agency, as is the FERC. The pipeline project would cross two New York State Forests, but it has been routed to minimize impacts as discussed in sections 3, 4.5, and 4.8 of the EIS.

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COMPANIES AND ORGANIZATIONS

CO39 – Allegheny Defense Project (cont'd)

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CO39-7
cont'd

In 2003, the Forest Service published a Forest-Wide Roads Analysis Report documenting the miles of roads in the ANF and the impacts to forest resources. The report noted that the Allegheny was unique in that it had a large number of roads for oil and gas drilling in addition to Forest Service roads and state/county roads. The report also documented how those roads and associated oil and gas drilling activities impact opportunities for recreation in the ANF:

The value of the land to provide recreation opportunities is diminished in intensively developed oil fields. The land is crisscrossed with roads, which are confusing to navigate and usually not open to public travel. The sounds of vehicles, pump engines and heavy equipment are common and pervasive. Trail systems that traverse these fields are interrupted by frequent road crossings. Some trails may be converted to roads when the trail is located in an appropriate location for road building. Mineral owners may continue to expand the oil field to the extent of its geologic limit. Some of the developed oil fields cover *thousands* of acres. *The inherent character of the landscape is converted to an industrial atmosphere in the midst of the forest.*

USFS. Allegheny National Forest Roads Analysis Report, p. 44 (2003) (emphasis added). (Attachment 8). Just a few years later, the Forest Service published a FEIS for its revised 2007 Land and Resource Management Project (Forest Plan). Regarding the impacts to public recreation, the FEIS stated that:

As a result [of oil and gas drilling in the Allegheny National Forest], those seeking a more remote and less developed recreation experience *could be displaced to other State or National Forests where remote, semi-primitive settings and experiences are more readily available.*

USFS. Allegheny National Forest Final Environmental Impact Statement for the Land and Resource Management Plan, p. 3-327 (2007) (emphasis added) (Attachment 9). Importantly, these statements were made prior to the shale gas boom so the additional impacts from shale gas extraction will only exacerbate the impacts to the Allegheny National Forest. FERC must take a hard look at how its actions, such as approving these Projects (and other connected, similar, and cumulative projects), facilitates additional extraction activities that have profound impacts on public resources such as the Allegheny National Forest.

- 2. According to Forest Service officials, oil and gas drilling is already causing substantial impacts to water quality wildlife habitat in the Allegheny National Forest and increased Marcellus Shale extraction will undoubtedly exacerbate those impacts.**

In 2009, ANF officials submitted declarations in Federal court documenting the impacts of oil and gas drilling in the ANF. For example, former Bradford District Ranger Anthony Scardina declared that:

...the [Bradford Ranger] District can no longer ensure that surface resources are being adequately protected, especially resources like water and wildlife that cross watershed boundaries, given the accelerated pace of new applications and magnitude of existing roads and well pads. Nor can the District ensure that multiple-use resource benefits are being provided in the public interest as mandated by Congress in the Multiple-Use Sustained-Yield Act of 1960 or National Forest Management Act of 1976.

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CO39 – Allegheny Defense Project (cont'd)

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CO39-7 cont'd	<p><i>Minard Run Oil Co. v. U.S. Forest Service</i>, Case No. 1:09-cv-00125-SJM, Doc. No. 18-5, Declaration of Anthony Scardina, p. 5. June 25, 2009 (emphasis added) (Attachment 10). Similarly, former Forest Supervisor Leanne Marten declared that:</p> <p>When you combine past [oil and gas] development with future projections, there are <i>many uncertainties</i> as to the environmental, social, and economic effects of these activities and <i>questions as to whether the Forest Service can adequately protect water, wildlife and other surface resources</i> or achieve national forest objectives to serve the public interest...Given the level of past and ongoing development, <i>it is no longer possible to propose adequate mitigation of surface impacts on resources such as water and wide-ranging wildlife species without a broader scale cumulative effects analysis.</i></p> <p>In many cases, the majority of surface effects from private OGD activities is the result of construction of roads to access well sites. The miles of road and their associated fragmenting impact across the Forest is something that cannot be overlooked or fairly assessed under present conditions by simply looking at OGD applications on a case-by-case basis.</p> <p><i>Minard Run Oil Co. v. U.S. Forest Service</i>, Case No. 1:09-cv-00125-SJM, Doc. No. 18-2, Declaration of Leanne Marten, pp. 3-4. June 25, 2009. (emphasis added) (Attachment 11).</p> <p>FERC has an obligation to consider whether its approval of the Project (and other connected, similar, and cumulative projects) “threatens a violation of Federal, State, or local law or requirements imposed for the protection of the environment.” 40 C.F.R. § 1508.27(b)(10). When Forest Service officials declare in Federal court, under penalty of perjury, that they can no longer ensure compliance with Federal laws regarding the protection of water and wildlife because of the existing level of oil and gas drilling infrastructure, FERC’s duty to consider this factor is even more important, especially when approval of the Projects (and other connected, similar, and cumulative projects) will likely lead to additional shale gas drilling and, as a result, additional impacts to the ANF and potential violations of Federal law regarding the protection of the environment.</p>
CO39-8	<p>C. FERC must consider and analyze the implications of increased natural gas extraction and pipeline construction/expansion on Pennsylvania’s State Forests and Parks.</p> <p>Pennsylvania has one of the most impressive state forest systems in the United States. At 2.1 million acres, the system consists of 20 state forests spread across the state. North Central Pennsylvania contains a fairly contiguous 1.2-million acre block of state forests that includes Elk, Moshannon, Susquehanna, Sprout, Tioga, and Tiadaghton State Forests. This area is roughly bounded by U.S. Route 219 on the west, U.S. Route 6 on the north, U.S. Route 15 on the east, and U.S. Route 220 and Interstate 80 on the south. Loyalsock State Forest is also near this area, between Susquehanna County and U.S. Route 15. FERC must consider and analyze the implications of increased natural gas extraction and pipeline construction/expansion on these and other Pennsylvania State Forests.</p>
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CO39-8 The specific production of natural gas is beyond the scope of the EIS and the authority of the FERC. Production, regardless of whether it occurs within state or federal lands (as opposed to private lands) has no bearing on the FERC’s responsibility to analyze it.

COMPANIES AND ORGANIZATIONS

CO39 – Allegheny Defense Project (cont'd)

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CO39-8
cont'd

The Pennsylvania Department of Conservation and Natural Resources (DCNR) has stated that the level of shale gas extraction in the state forests threatens its ability to sustainably manage them for the public good. For example, DCNR stated in a report that “there are zero State Forest Land acres suitable for gas leasing involving surface disturbance.” Pennsylvania Dept. of Conservation and Natural Resources. Impacts of Leasing Additional State Forest for Natural Gas Development. p. 48 (emphasis original) (Attachment 12). *See* http://www.dcnr.state.pa.us/cs/groups/public/documents/document/d_000603.pdf. This report also states:

Pennsylvania's State Forest System contains some of the most remote and wild forest in the Mid Atlantic Region. The largest and most remote areas are found within the Marcellus Shale Formation in the Northcentral portion of the state ... Part of the [DCNR] Bureau of Forestry's mission is to retain this wild character within the forest.

Id. at 14. FERC must analyze how its continued approval of natural gas projects such as those under consideration here are impacting “some of the most remote and wild forest in the Mid Atlantic Region.” Both the state and federal governments are failing to protect this incredible, wild area for the wildlife species that call it home and the public that needs wild areas to escape to in order to reconnect with nature.

Indeed, this area is part of the Pennsylvania Wilds, a state initiative to promote tourism in northern Pennsylvania. FERC must analyze how its actions are impacting the ability of Pennsylvania to increase tourism in this area. Citizens looking to their public lands for recreation are not likely to enjoy seeing Marcellus Shale gas wells, roads, pipelines and other infrastructure all over the landscape.

FERC must also analyze how its decisions are impacting Pennsylvania's State Parks on a regional level. For example, Cherry Springs State Park is renowned for its night skies and stargazing. According to the DCNR website, “[d]ue to its exceptionally dark skies, Cherry Springs State Park is *one of the best places on the eastern seaboard* for stargazing and the science of astronomy.” DCNR. Cherry Springs State Park. (emphasis added). *See* <http://www.dcnr.state.pa.us/stateparks/findapark/cherrysprings/>. In 2008, the International Dark-Sky Association (IDA) designated Cherry Springs State Park as a “Gold Tier” Certified International Dark Sky Park, the “highest award representing the dark skies.” International Dark-Sky Association, International Dark Sky Parks. *See* <http://darksky.org/night-sky-conservation?id=86#cherrysprings>. According to IDA, in a Gold Tier park, “the full array of visible sky phenomena can be viewed – e.g., aurora, airglow, Milky Way, zodiacal light, and faint meteors.” *Id.*

In the nomination materials, Cherry Springs State Park Operations Manager Harry Harrison stated:

Cherry Springs offers one of the last remaining unimpaired views of the night sky within the state, and also possible the eastern portion of the United States. Cherry Springs is exceptionally dark because it is surrounded by State Forest Lands in rural Potter County. Additionally, it is located atop the Allegheny Plateau with light from the few local towns being trapped behind the steep hillsides that characterize this region, allowing the night skies to retain their pristine

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CO39 – Allegheny Defense Project (cont'd)

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CO39-8 cont'd	<p><i>quality...Like clean air, water, and wildlife, a dark sky is an intrinsic natural resource that deserves to be protected. By taking steps to protect the night sky at Cherry Springs State Park, future generations of Pennsylvanians have been assured a clear view of the night sky in its natural state.</i></p> <p>DCNR. Cherry Springs State Park. International Dark Sky Park Designation (Gold Tier). Cherry Springs State Park Nomination Package. 2008 (emphasis added) (Attachment 13). <i>See</i> http://darksky.org/assets/documents/IDSPCherrySprings.pdf. FERC must examine how its decisions impact Cherry Springs State Park and whether such decisions threaten its "Gold Tier" designation as a Certified International Dark Sky Park. FERC must also explore whether its actions affect other state parks in Pennsylvania, including (but not limited to) the parks containing Pine Creek Gorge (aka, the Pennsylvania Grand Canyon). Unfortunately, the DEIS fails to discuss any of these issues.</p> <p>For example, in the cumulative effects analysis section on "land use, special interest areas, and visual resources," the DEIS states:</p> <p>The impact of Marcellus Shale development activities on land use, recreation, special interest areas, and visual resources would vary widely depending on the location of specific facilities and access roads, but would be minimized to the extent possible through the PADEP review and permitting process.</p> <p>DEIS, p. 4-226. This does not comply with NEPA's requirement to take a "hard look" at the potential environmental impacts of the proposed actions. FERC cannot rely on such "would be" projections of state agency actions to discharge its duties pursuant to NEPA.</p> <p>Also, the scope of FERC's cumulative effects analysis area is incredibly restrictive. According to the DEIS:</p> <p>Constitution's project, if built <i>at the same time</i> as other reasonably foreseeable future projects, could result in cumulative impacts on recreation and special-interest areas <i>if other projects affect the same areas or feature at the same time.</i></p> <p>DEIS, p. 4-226 (emphasis added). Even at the site-specific level, this "cumulative effects analysis" is unduly restrictive because it only considers other reasonably foreseeable projects that "affect the same areas or feature at the same time." This is both geographically and temporally too restrictive. Moreover, in terms of the regional scale of development associated with the Marcellus Shale, FERC must take a hard look, in a programmatic regional EIS, at the cumulative effects of shale gas development on a regional level.</p>
CO39-9	<p>D. FERC must consider and analyze the implications of increased natural gas extraction and pipeline construction/expansion on air quality and climate change.</p> <p>As the quotes from President Obama stated above indicate, many proponents of natural gas drilling trumpet its alleged benefits on being a "clean" fossil fuel. Of course, just because gas burns <i>cleaner</i> at the site of combustion than coal or oil, that does not make it "clean." Moreover,</p>
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The commentor's statements regarding relative emissions for production to end-use of fossil fuels are noted. See the response to comment CO26-19 concerning how the end-use combustion of natural gas, which may displace other fossil fuels such as oil or coal, may result in fewer future emissions than other fossil fuels. The FERC does not regulate the production or the potential export of coal or oil, and the effects of potential export of those resources upon the global climate are beyond the scope of this EIS.

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CO39 – Allegheny Defense Project (cont'd)

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assuming that the proponents of natural gas are correct and that the United States could reduce carbon emissions by switching to natural gas, that "reduction" only matters if the other fossil fuels the gas is "replacing" stay in the ground. But coal companies and oil companies are not just going to leave those fossil fuels in the ground. Thus, the extraction and burning of increased natural gas from shale is not a "reduction" in carbon emissions, but a net increase when viewed globally (which is the only figure that matters in terms of carbon emissions). It does not matter if the United States "reduces" emissions if those other sources of dirty energy are extracted and exported overseas for consumption. FERC must therefore analyze whether its facilitation of increased shale gas extraction is causing a net increase of carbon emissions globally in light of the fact that both the coal industry and the oil industry are planning export terminals around the country. See Washington Dept. of Ecology, Millennium Bulk Terminals Longview (MBTL) proposal, <http://www.ecy.wa.gov/geographic/millennium/>; Morrow Pacific, The Morrow Pacific Project, <http://morrowpacific.com/the-project>; Port of Grays Harbor, Proposed Crude Oil Facilities, <http://www.portofgraysharbor.com/about/CBR-Project.php>. FERC must explain how emissions are being reduced *globally* by making the United States more reliant on natural gas.

FERC must also take a hard look at whether it is increasing methane emissions from all of the natural gas extraction and transportation. According to a recent article in Nature:

Scientists are once again reporting alarmingly high methane emissions from an oil and gas field, underscoring questions about the environmental benefits of the boom in natural-gas production that is transforming the US energy system.

The researchers, who hold joint appointments with [NOAA] and the University of Colorado in Boulder, first sparked concern in February 2012 with a study suggesting that up to 4% of the methane produced at a field near Denver was escaping into the atmosphere. If methane, a potent greenhouse gas – is leaking from fields across the country at similar rates, it could be offsetting much of the climate benefit of the ongoing shift from coal- to gas-fired plants for electricity generation.

Industry officials and some scientists contested the claim, but at an American Geophysical Union (AGU) meeting in San Francisco, California, last month, the research team reported new Colorado data that support the earlier work, as well as preliminary results from a field study in the Uinta Basin of Utah suggesting even higher rates of methane leakage – an eye-popping 9% of the total production. That figure is nearly double the cumulative loss rates estimated from industry data – which are already higher in Utah than in Colorado.

Jeff Tollefson. *Methane leaks erode green credentials of natural gas*. Nature. Jan. 2, 2013 (emphasis added). See <http://www.nature.com/news/methane-leaks-erode-green-credentials-of-natural-gas-1.12123#ref-link-5>. FERC must consider whether further expansion of shale gas drilling and transportation in the Marcellus Shale region is increasing methane emissions and eroding any of the alleged benefits of natural gas production.

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CO39 – Allegheny Defense Project (cont'd)

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CO39-10

E. FERC must consider and analyze its decisions in light of Article I, Section 27 of the Pennsylvania Constitution.

NEPA requires FERC to consider “[w]hether the action threatens a violation of Federal, State, or local law or requirements imposed for the protection of the environment.” 40 C.F.R. § 1508.27(b)(10). The Pennsylvania Constitution guarantees that:

The people have a right to clean air, pure water, and to the preservation of the natural, scenic, historic and esthetic values of the environment. Pennsylvania’s public natural resources are the common property of all the people, including generations yet to come. As trustee of these resources, the Commonwealth shall conserve and maintain them for the benefit of all the people.

PA. CONST. art. I, § 27. FERC must consider and analyze whether its authorization of the Projects (and other connected, similar, and cumulative projects) threatens a violation of Article I, Section 27 of the Pennsylvania Constitution (the “Environmental Rights Amendment”). This analysis must not simply focus on whether FERC’s actions could potentially cause an agency of the Commonwealth to violate the Environmental Rights Amendment, but also whether FERC itself could violate the Environmental Rights Amendment. While the Amendment specifically charges the Commonwealth as trustee, the Amendment’s guarantee that “the people have a right to clean air, pure water, and to the preservation of the natural, scenic, historic and esthetic values of the environment” compliments Federal laws regarding environmental protection. As such, FERC’s decisions must be weighed in view of the strictures of the Environmental Rights Amendment.

In December 2013, the Pennsylvania Supreme Court held that recently enacted state legislation stripping communities of authority to regulate any aspects of oil and gas drilling activities was unconstitutional. *Robinson Township v. Commonwealth of Pennsylvania*, J-127A-D-2012 (2013). The Court explained the history of resource extraction industries in Pennsylvania and their impacts to Pennsylvania’s environment:

As we have explained, Pennsylvania has a notable history of what appears retrospectively to have been a *shortsighted exploitation of its bounteous environment, affecting its minerals, its water, its air, its flora and fauna, and its people*. The lessons learned from that history led directly to the Environmental Rights Amendment, a measure which received overwhelming support from legislators and the voters alike. When coal was “King,” there was no Environmental Rights Amendment to constrain exploitation of the resource, to protect the people and the environment, or to impose the sort of specific duty as trustee upon the Commonwealth as is found in the Amendment. *Pennsylvania’s very real and mixed past is visible today to anyone travelling across Pennsylvania’s spectacular, rolling, varied terrain*. The forests may not be primordial, but they have returned and are beautiful nonetheless; the mountains and valleys remain; the riverways remain, too, not as pure as when William Penn first laid eyes upon his colonial charter, but cleaner and better than they were in a relatively recent past, when the citizenry was less attuned to the environmental effects of the exploitation of subsurface natural resources. But, the landscape bears visible scars, too, as reminders of the past efforts of man to exploit Pennsylvania’s natural assets. Pennsylvania’s past is the necessary prologue here: the reserved rights, and the concomitant duties and constraints, embraced by the Environmental Rights Amendment, are a product of our unique history.

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The commentor’s statements regarding violation of the Pennsylvania Constitution are noted. The FERC is bound by federal laws and statutes governing its existence. The FERC has no authority to interpret Pennsylvania laws and statutes. See the response to comment CO26-18 regarding the Northeast Energy Direct Project (formerly called the Northeast Expansion Project). See the response to comment LA1-4 regarding a programmatic assessment and FA4-44 regarding cumulative impacts.

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CO39 – Allegheny Defense Project (cont'd)

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The type of constitutional challenge presented today is as unprecedented in Pennsylvania as is the legislation that engendered it. But, the challenge is in response to *history seeming to repeat itself: an industry, offering the very real prospect of jobs and other important economic benefits, seeks to exploit a Pennsylvania resource, to supply an energy source much in demand.* The political branches have responded with a comprehensive scheme that accommodates the recovery of the resource. *By any responsible account, the exploitation of the Marcellus Shale Formation will produce a detrimental effect on the environment, on the people, their children, and future generations, and potentially on the public purse, perhaps rivaling the environmental effects of coal extraction.* The litigation response was not available in the nineteenth century, since there was no Environmental Rights Amendment. The response is available now.

The challenge here is premised upon that part of our organic charter that now explicitly guarantees the people's right to an environment of quality and the concomitant expressed reservation of a right to benefit from the Commonwealth's duty of management of our public natural resources. The challengers here are citizens – just like the citizenry that reserved the right in our charter. They are residents or members of local legislative and executive bodies, and several localities directly affected by natural gas development and extraction in the Marcellus Shale Formation. Contrary to the Commonwealth's characterization of the dispute, the citizens seek not to expand the authority of local government but to *vindicate fundamental constitutional rights* that, they say, have been compromised by a legislative determination that violates a public trust. The Commonwealth's efforts to minimize the import of this litigation by suggesting it is simply a dispute over public policy voiced by a disappointed minority requires a blindness to the reality here and to Pennsylvania history, including Pennsylvania constitutional history; and, the position ignores the reality that Act 13 has the potential to affect the reserved rights of every citizen of this Commonwealth now, and in the future.

Robinson Township v. Commonwealth of Pennsylvania, J-127A-D-2012, 117-119 (2013).

History is currently repeating itself in the Commonwealth as the gas industry, the Obama administration, and FERC are acting to promote and facilitate the "shortsighted exploitation" of shale gas in the region. The Pennsylvania Supreme Court's noting that by "any responsible account, the exploitation of the Marcellus Shale Formation will produce a detrimental effect on the environment, on the people, their children, and future generations" that may rival the effects of coal extraction stands in stark contrast to FERC's consistent issuing of FONSI's in numerous other natural gas projects related to expanding exploitation of the Marcellus Shale formation. The Court also stated that:

At present, the concept of public natural resources includes not only state-owned lands, waterways, and mineral reserves, but also resources that implicate the public interest, such as *ambient air, surface and ground water, wild flora, and fauna (including fish)* that are outside the scope of purely private property.

Id. at 80 (citations omitted). FERC must consider and analyze the Projects (and other connected, similar, and cumulative projects) in light of the public trust doctrine enshrined in Pennsylvania's Constitution. Finally, the Court noted that:

A legal challenge pursuant to Section 27 may proceed upon alternate theories that either the government has infringed upon citizens' rights or the government has failed in its trustee obligations, or upon both theories, given that the two paradigms, while serving different purposes in the amendatory scheme, are also related and overlap to a significant degree.

COMPANIES AND ORGANIZATIONS

CO39 – Allegheny Defense Project (cont'd)

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cont'd | *Id.* at 72 (citations omitted). This is important because even though FERC may not have “trustee obligations,” it still may not take actions that “infringe[] upon citizens’ rights” protected under the Pennsylvania Constitution.

As the discussion above reveals, the need for a programmatic regional EIS is great. Even if FERC does not prepare a programmatic regional EIS, it must prepare a site-specific EIS for these Projects that include other connected, similar, and cumulative projects. This would include, at the very least, the inclusion of Tennessee’s Northeast Expansion Project.

CO39-11 | **IV. The DEIS does not adequately assess the cumulative effects of the projects.**

Other parts of this comment letter discuss specific failures of the DEIS. In addition to those failures, the following are additional problems with the DEIS’s cumulative effects analysis. According to the cumulative effects section on wildlife, the DEIS states:

In general, wildlife is expected to return to affected areas following construction of the proposed projects and other projects in the area.

DEIS, 4-224. This statement is contradicted by the evidence provided above regarding the migration of bobcats from northern Pennsylvania to southern New York in levels large enough to cause NYDEC to revise its bobcat management plan to account for the sudden population increase. It also demonstrates that FERC has not taken a hard look, either at the site-specific or regional level, of the impacts to wildlife habitat. This is why there is a need for a programmatic regional EIS. The DEIS goes on to state:

Construction of any Marcellus Shale development projects would also result in some long-term loss of wildlife habitat due to aboveground structures and well pads...Impacts on wildlife species from construction of any of the projects listed in table 4.13-1 *would be local, temporary, and minor*. Therefore, cumulative impacts are expected to be negligible for any individual wildlife species relative to the population in the region of influence.

DEIS, 4-224. This does not constitute a “hard look” at the potential impacts to wildlife habitat. Table 4.13-1 discloses at least 75 existing or proposed projects related to natural gas gathering systems, electric generation and transmission, transportation, and commercial/residential development. Additionally, Table 4.13-1 includes existing or proposed shale gas wells within 10 miles of the underlying projects. FERC provides no explanation for why the cumulative effects of so many projects and shale gas wells (and connected roads and infrastructure) “are expected to be negligible” to wildlife. Just because FERC thinks that does not make it so. FERC has to actually analyze the cumulative effects. Simply stating that the impacts on wildlife “would be local, temporary, and minor” does not constitute a “hard look.”

Furthermore, it ignores the impacts on a regional level. By limiting the cumulative effects analysis of shale gas wells on wildlife to just those wells within 10 miles of the underlying projects, FERC necessarily ignores the cumulative effects of thousands of other shale gas wells that have already been drilled in Pennsylvania. That is why FERC must prepare a programmatic

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Section 4.13.6.4 of the EIS further states that we expect that any projects constructed in the area would be required to restore vegetation cover to the disturbed areas unless they are covered by buildings or other impervious surfaces. Once the area is restored, some wildlife displaced during construction of any of the projects would return to the newly disturbed area and adjacent, undisturbed habitats after completion of construction. Construction of any Marcellus Shale development projects would also result in some long-term loss of wildlife habitat due to aboveground structures and well pads. In addition, wind energy projects could result in mortality to bird and bat species. Impacts on wildlife species from construction of any of the projects in the area of the proposed projects generally would be local, temporary, and minor, although some displacements could be permanent. Therefore, cumulative impacts are not expected to be significant for any individual wildlife species relative to the population in the region of influence.

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CO39-11 regional EIS to analyze such impacts. Even at the site-specific level of this EIS, FERC's
cont'd cumulative effects analysis is far too limited, both geographically and temporally.

CO39-12 **Conclusion**

FERC must prepare a programmatic regional EIS on shale gas extraction and transportation in the Marcellus Shale region. FERC has demonstrated that both it and the gas industry have a regional plan to exploit the Marcellus Shale (and other shale gas formations in the region) to increase reliance on natural gas, particularly in the northeastern United States. Moreover, the Obama administration's policies and statements reveal a strong push to promote the use of shale gas, including in the Marcellus Shale region. The Obama administration is even called for the creation of "sustainable shale gas development zones" in particular regions, which undoubtedly includes the Marcellus Shale region. Therefore, FERC must prepare a programmatic regional EIS to analyze the environmental consequences of shale gas extraction and transportation on a regional level. Until such an EIS is prepared and approved through a record of decision, no further site-specific natural gas projects in the Marcellus Shale region should be approved.

Dated: April 7, 2014

Respectfully submitted,

/s/ Ryan Talbott
Ryan Talbott
Executive Director
Allegheny Defense Project
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Enclosures

CO39-12 See the response to comments CO39-2 and LA1-4.

COMPANIES AND ORGANIZATIONS

CO39 – Allegheny Defense Project (cont'd)

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CERTIFICATE OF SERVICE

CO39-12
cont'd

Pursuant to Rule 2010 of FERC's Rules of Practice and Procedure, 18 C.F.R. § 385.2010,

I, Ryan Talbott, hereby certify that I have this day served the foregoing document upon each person designated on this official list compiled by the Secretary in this proceeding.

Dated: April 7, 2014

Respectfully submitted,

/s/ Ryan Talbott
Ryan Talbott
Executive Director
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COMPANIES AND ORGANIZATIONS

CO40 – Damascus Citizens for Sustainability

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Zimmerman & Associates

Environmental Litigation, Mediation, Enforcement & Compliance, Counseling

April 7, 2014

Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
888 First Street NE, Room 1
Washington, DC 20426

Jodi M. McDonald, Chief
Regulatory Branch, U. S. Army Corps of Engineers
New York District, CENAN-OP-R
Upstate Regulatory Field Office
Buffington Street, Bldg. 10, 3rd Floor
Watervliet, NY 12189

Re: Constitution Pipeline, FERC Docket Nos. CP13-499-000 and CP13-502-000; USACE
Docket No. NAN 2012-00449-UBR

CO40-1 Dear Secretary Bose and Chief McDonald:

On behalf of Damascus Citizens for Sustainability, Inc. (DCS), I am submitting the following comments on the Draft Environmental Impact Statement (DEIS) for the pipeline projects referenced above. DCS is a nonprofit citizens grassroots environmental organization dedicated to the protection of communities, individuals, the environment and public health from the risks associated with the exploration, production, development, transmission, distribution and consumption of unconventional natural gas produced by high volume slick water hydraulic fracturing. We appreciate this opportunity to provide comments on the DEIS.

First and foremost, we are adding our voice to those organizations and individuals, including the U.S. Environmental Protection Agency, the U.S. Department of the Interior, and the New York State Department of Environmental Conservation, that have requested an extension of the comment period for at least an additional sixty (60) days. The applicant in this case has submitted modifications to the project during the DEIS comment period that are significant. These are the addition of telecommunication towers along the pipeline right of way and installation of taps along the pipeline to provide gas service to four communities adjacent to the pipeline route. While the original comment period itself was too limited to allow full evaluation and submission of meaningful comments, the addition of these towers and taps raises further environmental issues that must be evaluated through the National Environmental Policy Act (NEPA) process. In accordance with the NEPA regulations of the Council On Environmental Quality, significant changes to a project require additional evaluation. See, 40 CFR 1502.9.

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CO40-1 See the response to comment FA1-1.

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COMPANIES AND ORGANIZATIONS

CO40 – Damascus Citizens for Sustainability (cont’d)

S-433

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Zimmerman & Associates Environmental Litigation, Mediation, Enforcement & Compliance, Counseling	
CO40-2	As discussed below, the major issues of concern to DCS relate to radon in the natural gas that will flow through this pipeline. Modifying the pipeline to provide gas to additional communities closer to the gas production area will reduce the time available for radioactive decay of the radon entrained in the natural gas. This may result in significantly greater potential exposure that should be evaluated under NEPA and the comment period should be extended to allow such review and input.
CO40-3	This brings us to our major comment on the DEIS, the wholly inadequate evaluation of the public health and environmental impacts from radon in the gas that will be transported by the Constitution pipeline. The DEIS includes only three paragraphs on the issue of radon exposure. The DEIS observes that the longer the transportation distance and subsequent time prior to consumption, the lower the levels of radon in the natural gas. However, no data is provided about the levels of radon at the wellhead, at the gathering pipelines, at the beginning of the Constitution pipeline, or at any point where the gas reaches a consumer. The DEIS notes that the total length of the Constitution pipeline will be just under 125 miles. Gas in a pipeline travels at a speed between 15 and 20 miles per hour so it will take about 6 to 8 hours for the gas to get from one end of the pipeline to the other. With a half life of 3.83 days, the radon level will decline by only 6.5 % to 8.7% during transmission from one end of the pipeline to the other. We cannot evaluate whether there will be dangerous radon levels remaining in the gas once it reaches the consumer because the DEIS provides no data about radon levels at the upstream end of the pipeline. While there is very little data reported in the scientific literature, what little data there is has reported radon levels in gas produced in northeastern Pennsylvania as high as 250 picocuries per liter. With an action level by USEPA of 4 picocuries and by the World Health Organization of 2.7 picocuries, there is a very significant likelihood that the radon content of the gas that reaches the downstream end of this pipeline may have significant adverse health effects. We seriously question whether any of the sources referenced by the DEIS (Johnson, Gogolak, van Netten, or Dixon) would consider radon levels of 200 or more picocuries to be insignificant from a public health standpoint.
CO40-4	FERC staff has suggested a range of mitigation measures to be added to the certificate approval for this pipeline. Measurement and reporting of radon levels at the point of connection with gathering lines, at the end of the pipeline where it connect to another pipeline, and at intermediate points such as compressor stations, metering and regulating stations, and taps for customers along the pipeline should be conditions added to those already recommended by staff.
CO40-5	The DEIS also mentions that gas processing and storage will reduce radon levels in the post-processing or post-storage gas. We agree that storage can allow additional time for radon in the gas to radioactively decay, but there is no mention in the DEIS of where and how such storage is included in this pipeline project. Further, no where it the staff recommendations of mitigation measures is there any mention of requiring storage to reduce radon levels at the point of consumption. We also agree that processing by refrigeration can result in significant condensation of radon gas into the liquid state as part of any production of LPG. However, there has been no commitment by the applicant or any suggestion from FERC staff to require the gas
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CO40-2	See the response to comment LA5-6 and the response to comment FA1-1.
CO40-3	The discussion of radon in section 4.11.1.4 of the EIS has been updated with new information.
CO40-4	The commentor’s suggestion that the FERC require radon monitoring is noted.
CO40-5	The storage or processing of natural gas is not part of the proposed projects. Section 4.11.1.4 of the EIS describes radon issues including non-project activities that may result in a reduction of radon levels prior to combustion. This section has been updated with new information.

COMPANIES AND ORGANIZATIONS

CO40 – Damascus Citizens for Sustainability (cont’d)

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Zimmerman & Associates

Environmental Litigation, Mediation, Enforcement & Compliance, Counseling

CO40-5
cont'd

that will travel through this pipeline to be processed to remove radon before it reaches the consumer.

CO40-6

Finally, the DEIS refers to venting as a means to reduce radon levels at the point of consumption. However, the DEIS does not cite a single federal, state or local law or regulation that requires such venting. Mitigation measures to provide such venting is another opportunity for the staff to include suggested conditions to be added to a certificate for this pipeline.

We appreciate this opportunity to provide comments on the DEIS. If the comment period is extended, we will provide additional details and information of the radon issue, as well as other aspects of the DEIS. Please contact me at your convenience if there are any questions concerning these comments.

Sincerely,

/s/ J.J. Zimmerman

John J. Zimmerman

Counsel for Damascus Citizens for Sustainability

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CO40-6

The FERC has no regulatory authority over venting or other measures that may be used to reduce radon levels at the point of natural gas consumption. Section 4.11.1.4 of the EIS has been updated with new information.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice



EARTHJUSTICE



FOUNDED 1892

April 7, 2014

Via Electronic Filing

Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
888 First Street NE
Washington, DC 20426

Re: **Comments on Draft Environmental Impact Statement for Constitution Pipeline and Wright Interconnect Projects, Docket Nos. CP13-499-000; CP13-502-000; PF12-9**

Dear Secretary Bose:

CO41-1

On behalf of intervenors Catskill Mountainkeeper, Clean Air Council, Delaware-Otsego Audubon Society, Delaware Riverkeeper Network, Riverkeeper, Inc., and Sierra Club ("Intervenors"), we respectfully submit these comments on the Draft Environmental Impact Statement ("Draft EIS") for the Constitution Pipeline and Wright Interconnect Projects, issued February 12, 2014 by the Federal Energy Regulatory Commission ("Commission"). These comments augment the technical and scientific comments prepared by Marc Henderson and Kevin Heatley, which are incorporated by reference and attached hereto as Exhibits A and B, respectively. For the reasons explained in those reports and herein, the Draft EIS falls short of what is required under the National Environmental Policy Act ("NEPA"), 42 U.S.C. §§ 4331 *et seq.*

Because many of the Draft EIS's deficiencies can be cured only with the submission and analysis of new studies that should be subject to public scrutiny, we urge the Commission to collect the missing information, perform the new analyses, and issue a revised draft EIS for another round of public review and comment before it issues a final EIS for these Projects. Until all of the relevant data has been released and examined, the Commission lacks any legitimate basis for a decision under NEPA or a public interest determination under the Natural Gas Act.

CO41-2

I. Project Background

On June 13, 2013, the Constitution Pipeline Company, LLC ("Constitution") and Iroquois Gas Transmission System, L.P. ("Iroquois") each filed an application with the

CO41-1

See the response to comment FA1-1.

CO41-2

The cutting of mature trees and forest fragmentation would occur as a result of the proposed projects as discussed in section 4.5 of the EIS. These impacts would be minimized or mitigated by the reduction of the construction right-of-way in interior forest areas, regrowth of trees in approximately 54 percent of the previously forested areas cleared during construction, and implementation of Constitution's Preliminary Migratory Bird and Upland Forest Plan, as we have recommended. Constitution and Iroquois would both implement sediment and erosion controls based upon our Plan and Procedures, which were revised in 2013, as well as other proposed measures to prevent negative effects of stormwater runoff. See the response to comment CO1-5 regarding flooding.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont'd)

S-436

CO41-2 cont'd	<p>Commission for a certificate of public convenience and necessity ("Certificate").¹ Constitution seeks approval to construct and operate a 124-mile interstate natural gas transmission pipeline along with various associated facilities ("Pipeline Project" or "Project"). Iroquois seeks to construct and operate pipeline connection and compression facilities ("Wright Interconnect Project") and to lease the incremental pipeline capacity associated with such facilities, located at the eastern terminus of the Pipeline Project in Wright, New York, to Constitution.</p> <p>If approved, the Pipeline Project will cut through Broome, Chenango, Delaware, and Schoharie Counties in New York and Susquehanna County in Pennsylvania, disturbing more than 1,862 acres of land and leaving at least 748 acres permanently altered. The Project is largely greenfield construction, with a mere nine percent of the proposed 124-mile route co-located with existing rights-of-way. Project construction will result in the clear-cutting of hundreds of thousands of trees in the 1,024.5 acres of forest land that will be disturbed by the Project, including 439.7 acres of interior forest.² The permanent conversion of forest to open land will fragment important habitat, will result in increased stormwater runoff, and will compromise the area's resilience to flooding in the face of increased precipitation and more frequent and intense storm events. The Pipeline Project will cross multiple public drinking water supply sources, three watersheds, at least 91.8 acres of wetlands, and 277 waterbodies, including designated high quality streams, trout streams, and at least 99 protected streams.</p>
CO41-3	<p>Along with 124 miles of pipeline and seventeen miles of access roads that will cut across forests and water resources, the Pipeline Project will be served by two compressor stations: Iroquois' proposed 21,800-horsepower Wright Interconnect Project and Williams' 17,970-horsepower Central Compressor Station, located in Brooklyn Township, Pennsylvania. These sources, together with construction equipment and other operational facilities, will emit harmful air pollution, including criteria pollutants such as nitrogen oxides ("NOx"), and hazardous air pollutants such as volatile organic compounds ("VOCs"), which also are ozone precursors. The Pipeline Project also will result in the direct emission of climate-change-causing greenhouse gases ("GHGs"): carbon dioxide ("CO₂") and nitrous oxide ("N₂O") from compressor engines, line heaters, and generators; fugitive methane emissions from compressors and the pipeline; and black carbon emissions from diesel vehicles and equipment.</p>
CO41-4	<p>In addition to the direct impacts to natural resources located in the immediate vicinity of the Projects, the availability of the infrastructure necessary to bring gas to market through a region underlain by the Marcellus Shale formation is likely to induce the development of additional gas wells, including those developed utilizing the extraction technique of high volume hydraulic fracturing. Such development brings with it water, air, and land pollution and could transform dozens of quiet, rural communities—presently consisting primarily of forest and farm lands—into industrial zones, plagued by constant truck traffic, the disappearance of scenic vistas, and noise and light pollution, among other impacts. The Pipeline Project also will induce</p> <p>¹ Constitution Pipeline Company, LLC, Application for Certificate of Public Convenience and Necessity, FERC Docket No. CP13-499-000 (filed June 13, 2013); Iroquois Gas Transmission System, LP, Application for Certificate of Public Convenience and Necessity, FERC Docket No. CP13-502-000 (filed June 13, 2013).</p> <p>² As discussed below, the projection of impacts to forests presented in the Draft EIS seriously underestimates the total area of interior forest that will be affected by the Project. See Section II.C, <i>infra</i>.</p>

CO41-3

As stated in section 4.11.1.3 of the EIS, operation of the compressor station would not be expected to have significant impacts on local or regional air quality. Emissions resulting from diesel- and gasoline-fueled construction equipment and vehicle engines for both projects would be minimized by federal design standards required at the time of manufacture of the equipment and vehicles, and would comply with the EPA's mobile and non-road emission regulations.

CO41-4

See the response to comment LA1-4.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont'd)

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CO41-4 cont'd	construction and operation of a new distribution system for transportation of gas from the pipeline to delivery points along the five-county route, causing additional impacts to the environment surrounding the Project area.
CO41-5	Intervenors filed comments on Constitution's application on July 17, 2014, identifying various resource areas of concern and calling on the Commission to conduct a comprehensive review of all potential significant adverse environmental effects of the Pipeline Project, in accordance with the requirements of NEPA, including the Project's potential to cause degradation of water resources, impairment of ecosystem services, diminished air quality, forest fragmentation, harm to wildlife and botanical species of concern, permanent landscape alteration, disruption of community character, and threats to community safety. ³
CO41-6	On February 12, 2014, the Commission issued the Draft EIS. As discussed in detail below, the Draft EIS identifies a number of studies, analyses, and other plans that remain outstanding, it fails to assess the full scope of impacts to water, forest, and air resources, and it ignores the indirect and cumulative impacts of the Projects. Until the Commission addresses these major deficiencies in a revised draft EIS, released for public review and comment, it cannot satisfy the requirements of NEPA.
CO41-7	<p>II. The Draft EIS Fails to Take the Requisite "Hard Look" at the Environmental Impacts of the Proposed Action and at the Potential Ways to Avoid or Mitigate Those Impacts.</p> <p>NEPA is our "basic national charter for protection of the environment." 40 C.F.R. § 1500.1(a). As such, it makes environmental protection a part of the mandate of every federal agency. See 42 U.S.C. § 4332(1). NEPA requires that federal agencies take environmental considerations into account in their decision-making "to the fullest extent possible." 42 U.S.C. § 4332. To this end, federal agencies must consider environmental harms and the means of preventing them in a "detailed statement" before approving any "major federal action significantly affecting the quality of the human environment." <i>Id.</i> § 4332(2)(C). When preparing an EIS, an agency must take a detailed, "hard look" at the environmental impact of and alternatives to the proposed action. <i>Robertson v. Methow Valley Citizens Council</i>, 490 U.S. 332, 350 (1989). This required analysis serves to ensure that "the agency will not act on incomplete information, only to regret its decision after it is too late to correct." <i>Marsh v. Oregon Natural Res. Council</i>, 490 U.S. 360, 371 (1979).</p> <p>NEPA also "guarantees that the relevant information [concerning environmental impacts] will be made available to the larger audience," including the public, "that may also play a role in the decisionmaking process and the implementation of the decision." <i>Robertson</i>, 490 U.S. at 349. As NEPA's implementing regulations explicitly provide, "public scrutiny [is] essential to implementing NEPA." 40 C.F.R. § 1500.1(b). The opportunity for public participation guaranteed by NEPA ensures that agencies will not take final action until after their analysis of the environmental impacts of their proposed actions has been subject to public scrutiny. See <i>N.</i></p>

³ Catskill Mountaineer, *et al.*, Comments on Application of Constitution Pipeline Company, LLC for Certificate of Public Convenience and Necessity, FERC Docket No. CP13-499-000 (filed July 17, 2013) ("Application Comments") (incorporated fully by reference herein).

- CO41-5 Sensitive resources, as well as potential impacts and mitigation, are discussed in the EIS for interior forest and forest fragmentation (section 4.5.3), waterbodies (section 4.3.3), air quality (section 4.11.1), wildlife (section 4.6.1), vegetation (4.5), and safety (4.12).
- CO41-6 See the response to comment FA1-1. Cumulative impacts are discussed in section 4.13 of the EIS.
- CO41-7 See the response to comment FA1-1 and comment SA1-2.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont'd)

CO41-7
cont'd

Plains Res. Council v. Surface Transp. Bd., 668 F.3d 1067, 1085 (9th Cir. 2011) (noting that where “data is not available during the EIS process and is not available to the public for comment,” the process “cannot serve its larger informational role, and the public is deprived of their opportunity to play a role in the decision-making process”) (quoting *Robertson*, 490 U.S. at 349).

An EIS must fully assess and disclose the complete range of environmental consequences of the proposed action, including “ecological (such as the effects on natural resources and on the components, structures, and functioning of affected ecosystems), aesthetic, historic, [and] cultural” impacts, “whether direct, indirect, or cumulative.” 40 C.F.R. §§ 1502.16(a), (b); 1508.8. Direct effects are “caused by the action and occur at the same time and place.” 40 C.F.R. § 1508.8(a). Indirect effects are those impacts that are caused by the action, but occur “later in time or farther removed in distance, but are still reasonably foreseeable,” and may include “growth inducing effects and other effects related to induced changes in the pattern of land use, population density or growth rate, and related effects on air and water and other natural systems, including ecosystems.” 40 C.F.R. § 1508.8. Cumulative impacts are “impact[s] on the environment which result[] from the incremental impact of the action *when added to other past, present, and reasonably foreseeable future actions regardless of what agency (Federal or non-Federal) or person undertakes such other actions.*” 40 C.F.R. § 1508.7 (emphasis added). As the regulations make clear, “[c]umulative impacts can result from individually minor but collectively significant actions taking place over a period of time.” *Id.* In addition, NEPA requires FERC to take a hard look at the ways to avoid or mitigate the Projects’ impacts.

NEPA is an “environmental full disclosure law.” *Monroe Cnty. Conservation Council, Inc. v. Volpe*, 472 F.2d 693, 697 (2d Cir. 1972). It requires that an agency obtain and consider detailed information concerning environmental impacts, and it “ensures that an agency will not act on incomplete information, at least in part, by ensuring that the public will be able to analyze and comment on an action’s environmental implications.” *Ohio Valley Envtl. Coal. v. U.S. Army Corps of Eng’rs*, 674 F. Supp. 2d 783, 792 (S.D. W. Va. 2009) (internal quotation marks and citations omitted). The information provided to the public “must be of high quality” because “[a]ccurate scientific analysis, expert agency comments, and public scrutiny are essential to implementing NEPA.” 40 C.F.R. § 1500.1(b). The potential adverse effects of the Pipeline Project cannot be adequately analyzed without complete data on all affected resources.

A. The Draft EIS Is Based on Incomplete Information.

Although Constitution has been submitting information relating to the environmental impacts of the Pipeline Project since May 2012, it has yet to file a number of expressly requested studies, analyses, and other plans that are essential to the public review and governmental decision-making required under NEPA. Until Constitution provides the Commission with complete information regarding the full suite of environmental impacts caused by the Project, the Commission is in no position to reach any conclusion about the significance of such impacts.

The Draft EIS suggests that the Commission intends to proceed without even collecting much needed data and information about the potential environmental impacts of the Projects. At

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

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CO41-7 cont'd	<p>the very least, the Commission should insist that Constitution file the following admittedly missing information, which then should be presented to the public in a revised draft EIS:</p> <ul style="list-style-type: none">• geotechnical feasibility studies for all trenchless crossing locations, Draft EIS at 4-4;• analysis of slope stability at milepost 30.3, <i>id.</i> at 4-14;• identification of all water wells and springs within 150 feet of the proposed pipeline and contractor yards, <i>id.</i> at 4-38;• surveys for all proposed contractor yards concerning water wells, waterbodies, and wetlands, <i>id.</i> at 4-40;• site-specific plans for the permanent access road crossings of wetlands and waterbodies, including site-specific justification for the use of permanent fill, <i>id.</i> at 4-45;• waterbody-specific description of impacts cause by workspaces and proposed impact avoidance, minimization, and mitigation measures, <i>id.</i> at 4-52;• description of proposed access roads leading to meter stations, including maps, of impacts on vegetation, and of any proposed mitigation, <i>id.</i> at 4-69;• upland forest mitigation plan, <i>id.</i> at 4-71;• results of invasive plant surveys and planned locations of weed wash stations, <i>id.</i> at 4-72;• site-specific blasting plans that include protocols for in-water blasting and the protection of aquatic resources and habitats, <i>id.</i> at 4-92;• information regarding water withdrawals for hydrostatic testing, including timing restrictions, <i>id.</i> at 4-93;• impact avoidance or effective impact minimization or mitigation measures for dwarf wedgemussels, <i>id.</i> at 4-97;• surveys for Northern monkshood, <i>id.</i> at 4-98;• impact avoidance or effective impact minimization or mitigation measures for Northern monkshood, <i>id.</i>;• bald eagle survey results, <i>id.</i> at 4-101;• bald eagle mitigation plan, <i>id.</i>;• impact avoidance or effective impact minimization or mitigation measures for bat species, <i>id.</i> at 4-102;• survey results for state-listed species and mitigation measures, <i>id.</i> at 4-104;• classification of unsurveyed residential structures, <i>id.</i> at 4-118;• residential crossing plan, <i>id.</i> at 4-120;• impact avoidance or effective impact minimization or mitigation measures for specialty crops, <i>id.</i> at 4-126;• construction emissions plan, including mitigation measures, <i>id.</i> at 4-166;• noise mitigation measures, <i>id.</i> at 4-183; and
CO41-8	<ul style="list-style-type: none">• information regarding the Leatherstocking interconnection/distribution plan, <i>id.</i> at 4-217.

CO41-8

See the response to comment FA4-46.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-440

CO41-9	<p>The Commission also should require production of the additional studies described in the discussion below of particular categories of impacts as well as all outstanding responses to requests for information by the Commission and other agencies.</p> <p>NEPA does not permit agencies to “act first and study later.” <i>Nat’l Parks & Conservation Ass’n v. Babbitt</i>, 241 F.3d 722, 734 (9th Cir. 2001). The missing information listed above “is precisely the information and understanding that is required <i>before</i> a decision that may have a significant adverse impact on the environment is made.” <i>Id.</i> at 733 (emphasis in original). Granting Constitution’s application, even with conditions requiring submission of the missing information before construction begins, defeats NEPA’s purpose. Instead, the Commission must revise the Draft EIS to provide accurate, consistent and complete data and analyses by which it and other agencies relying on its information can take a hard look at the potential impacts of the proposed Projects.</p>
CO41-10	<p>B. Analysis of Impacts to Water Resources Is Inadequate.</p> <p>Marc Henderson, a water resources engineer at Meliora Environmental Design, LLC, has prepared a report (“Meliora Report”) (annexed as Exhibit A) that identifies a number of serious problems in the Draft EIS. As the Meliora Report explains, the Draft EIS dramatically underestimates the extent to which Project construction activities will cause compaction of soils, fails to adequately analyze the impacts to water quality associated with construction activities in areas with steep slopes and highly erodible soils, fails to evaluate individual stream crossings and the impact associated with the crossing method proposed for each stream, and fails to evaluate the need for temporary workspace disturbances on a site-specific basis. The report recommends that feasibility studies for stream-crossing methods other than open cut crossings be performed for all proposed crossings and that open cut crossings should be minimized wherever possible. The report also recommends that soil testing be required to determine if decompaction is necessary prior to revegetation of areas disturbed by construction in order to protect groundwater resources and that the need to site temporary workspaces within wetlands be evaluated on a site-specific basis. The following discussion augments the observations and conclusions contained in the Meliora Report.</p> <p>Soil Compaction</p> <p>The Draft EIS acknowledges that shallow aquifers could be affected by “changes in overland water flow and recharge caused by clearing, grading, and trenching of the right-of-way” and that “near-surface soil compaction caused by heavy construction vehicles could reduce the soil’s ability to absorb water in these isolated areas.” Draft EIS at 4-40. Nevertheless, the Draft EIS contemplates soil compaction testing only in certain agricultural and residential areas—a mere 1.6 percent of the total area of disturbance. <i>Id.</i> at 4-31. According to the Draft EIS, “Constitution would restore the ground surface as closely as practicable to original contours and revegetate any exposed soils to ensure restoration of pre-construction overland flow and recharge patterns.” <i>Id.</i> at 4-40. Restoration of ground surface alone, without soil decompaction measures, including tilling of compacted subsurface soils, is not sufficient to protect against the adverse impacts that construction-related soil compaction will have on groundwater resources. The</p>

CO41-9

See the response to comment FA1-1 and comment SA1-2.

CO41-10

As provided in table 4.8.1-1 of the EIS, agricultural and residential areas would account for 24.2 percent of the total area disturbed during construction rather than 1.6 percent as stated by the commentor. Compaction testing in agricultural and residential areas is consistent with our Upland Erosion Control, Revegetation, and Maintenance Plan (Plan). In addition, as stated in section 4.4.3 of the EIS, wetlands would be decompacted as necessary. See the response to comment FA4-34 regarding study of potential trenchless crossing methods at other waterbodies.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-441

CO41-10
confd | scope of soil compaction testing should be expanded, and, based on the results of such testing, subsurface soil decompaction should be required.

CO41-11 | *Stream and Wetlands Crossings*

Pipeline Project construction would entail the crossing of hundreds of streams and wetlands.⁴ Draft EIS, Apps. K and L. Constitution is proposing trenchless crossing methods for only 37 of them. Draft EIS, Table 4.1.1-3. Trenchless crossing techniques do not disturb the streambed or impact water flow, nor do they directly increase turbidity, thus minimizing adverse environmental impacts compared to open trench methods. These techniques are recommended by both New York State Department of Environmental Conservation (“NYSDEC”)⁵ and the U.S. Fish and Wildlife Service (“U.S. FWS”).⁶ However, according to the Draft EIS, the vast majority of streams and wetlands along the pipeline route would be subject to open cut crossing for pipeline trench excavation.

In its application, Constitution noted that it was investigating waterbody crossings to “determine the feasibility of using trenchless construction methods.”⁷ The Commission requested that Constitution evaluate the feasibility of using trenchless crossing methods for all sensitive or high quality waterbodies.⁸ Constitution has since concluded that, for 254 of the 277 proposed stream crossings, trenchless crossings would be impractical. Draft EIS at 4-4, 4-49. However, the company has not completed or submitted site-specific feasibility studies in support of this conclusion. *Id.* at 4-4.

The submission of geotechnical feasibility studies for Constitution’s proposed trenchless crossings after the close of the public comment period, as the Draft EIS suggests, Draft EIS at 4-4, cannot satisfy NEPA’s requirements. The very purpose of NEPA is to ensure that the full impact of an agency action is understood *before* a decision is made whether or not to take that action. Granting the Certificate without first evaluating the feasibility of less environmentally destructive construction methods would defeat this purpose. The requested studies should be

⁴ The Draft EIS fails to provide a total number of waterbodies and wetlands crossed. Last month, the U.S. Army Corps of Engineers estimated that the Project would cross 359 waterbodies and 1,709 wetlands (totaling 147 acres). U.S. Army Corps of Eng’rs, Public Notice, Announcement of Public Hearings and Request for Comment on Application by Constitution Pipeline Company, LLC for Section 404 Permit 8 (March 4, 2014), *available at* <http://www.nan.usace.army.mil/Portals/37/docs/regulatory/publicnotices/2014/Mar14/Signed%20Public%20Notice%202012-00449.pdf>, *see also* U.S. Army Corps of Eng’rs, Comments on Draft EIS for Constitution Pipeline Project, FERC Docket No. CP13-499-000 (filed Apr. 7, 2014) (noting inconsistencies in identification of wetland and stream crossings).

⁵ NYSDEC, Preliminary Comments on Notice of Application for Constitution Pipeline Company, LLC (Project) 3, FERC Docket No. CP13-499-000 (filed July 17, 2013); NYSDEC, Comments on the Scope of Environmental Impact Statement for the Constitution Pipeline Project 3, FERC Docket No. PF12-9-000 (filed Nov. 7, 2012).

⁶ U.S. FWS, Comments on Notice of Intent to Prepare Environmental Statement for the Planned Constitution Pipeline Project 2-3, FERC Docket No. PF12-9-00 (filed Oct. 5, 2012).

⁷ Constitution, Environmental Report, Resource Report 2: Water Use and Quality 2-55, FERC Docket No. CP13-499-000 (filed November 2013).

⁸ FERC, Environmental Information Request for the Constitution Pipeline and Wright Interconnect Projects 3, FERC Docket No. CP13-499-000 (filed Aug. 29, 2013).

CO41-11

See the response to comment FA1-1. As stated in section 4.1.1.2 of the EIS, geotechnical studies for the remaining nine sites are either ongoing or not started due to lack of site access. Geotechnical study results for the three completed studies were provided as part of Constitution’s application and can be accessed at http://elibrary.ferc.gov/0/idmws/file_list.asp?document_id=14160901. Any studies requested by the Commission would be reviewed by the FERC staff and would be available on our eLibrary system for public review.

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CO41 – Earthjustice (cont’d)

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CO41-11 cont'd	<p>provided as soon as possible, and the public should be afforded the opportunity to review and submit comments on them before the Commission issues a final EIS or makes any determinations with respect to Constitution's application.</p> <p>The Draft EIS identifies additional outstanding information regarding the Project's impact on water resources and calls on Constitution to provide the results of surveys for all proposed contractor yards not previously submitted concerning water wells, waterbodies, and wetlands, as well as the status of any required agency consultations. Draft EIS at 4-40. The Draft EIS also recommends that Constitution file with the Commission site-specific plans for the proposed permanent access road crossings of waterbodies and wetlands, site-specific justifications for the use of permanent fill, and agency consultations regarding these plans. <i>Id.</i> at 4-45. Once these results and plans are filed, the public should be afforded the opportunity to review and comment on them.</p> <p>Moreover, in order to satisfy NEPA's requirements, the Commission must conduct independent evaluations of the feasibility of trenchless stream crossings and of the impacts of contractor yards and access roads on waterbodies and wetlands. Absent such analyses, the Commission is not in a position to draw conclusions about the significance of the impacts to water resources associated with Project construction through hundreds of waterbodies and wetlands.</p>
CO41-12	<p>Finally, Intervenor⁹ and U.S. FWS¹⁰ both recommended that surface water quality testing be conducted prior to any waterbody crossing in order to obtain a baseline against which post-construction water quality conditions could be measured. The Draft EIS ignores this recommendation. Absent collection of water quality data before construction, it will be impossible to judge the efficacy of measures employed to mitigate adverse impacts to water quality or to hold Constitution responsible for restoring resources to pre-construction conditions.</p>
CO41-13	<p><i>In-Stream Blasting</i></p> <p>In their Application Comments, Intervenor⁹ voiced their opposition to Constitution's proposed use of in-stream blasting, an extreme excavation technique that maximizes, rather than minimizes, adverse environmental impacts. While the Draft EIS notes that in-stream blasting is not anticipated, it provides for the possibility that it could be used during Project construction to facilitate crossings of waterbodies with a shallow depth to bedrock. Draft EIS at 4-92. In the event that in-stream blasting were to be proposed, Constitution would be required to develop and submit to the Commission an in-stream blasting plan. Constitution's failure to make any final determination on the need for blasting until the time of construction and only at that point to develop site-specific blasting plans effectively removes such plans and the potential impacts of the activity from public review and comment. Moreover, it circumvents the purpose of environmental review, which is to help the Commission determine the Project's likely</p>

⁹ Application Comments at 9.

¹⁰ U.S. FWS, Comments on Notice of Intent to Prepare Environmental Statement for the Planned Constitution Pipeline Project 2, FERC Docket No. PF12-9-00 (filed Oct. 5, 2012).

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CO41-12	Selected waterbodies would be crossed with trenchless techniques; all others are proposed for dry crossing methods, which would limit impacts on water quality. There are no current plans for surface water quality monitoring as the work would be conducted under dry conditions and the stream channel and banks would be restored prior to restoration of the flow. Surface water quality monitoring could be a condition of permitting by other agencies such as the COE, the PADEP, or the NYSDEC.
CO41-13	If an in-stream blasting plan was necessary, the plan would be reviewed and approved by the FERC staff. As stated in section 4.6.2.3 of the EIS, the in-stream blasting plan (if necessary) would comply with state-specific regulations and permit conditions. Additionally, Constitution must notify all appropriate federal and state authorities at least 48 hours before blasting within the waterbody, or as specified in applicable permits. Finally, Constitution must maintain downstream flow after blasting within streams.

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CO41-13 cont'd	<p>environmental impacts. The Commission cannot evaluate the significance of the potential impacts of in-stream blasting absent the provision of site-specific information.</p> <p>Given the purpose of NEPA to provide information about the impacts of agency action <i>before</i> such action is taken, Constitution should prepare an in-stream blasting plan as soon as possible, and the public should be afforded an opportunity to review and comment on the adequacy of the plan prior to the issuance of a final EIS. The Commission's recommendation that a blasting plan be provided only prior to the blasting itself and with no opportunity for public participation cannot ensure the adequate protection of the streambeds, aquatic ecosystems, and water quality that are put at risk by such activities.</p> <p>If Constitution demonstrates that it would be infeasible to determine whether in-stream blasting will be utilized before the commencement of construction, then it should provide an analysis of impacts to streams that would be caused if blasting was employed at every proposed stream crossing within the 45.5 miles of shallow depth to bedrock. The Commission, in turn, should base its analysis of impacts to streams on an assumption of the worst-case scenario whereby in-stream blasting at every crossing in areas of shallow depth to bedrock is assumed.</p>
CO41-14	<p>Wetlands</p> <p>The Draft EIS identifies 91.8 acres of wetlands that will be affected by Project construction activities.¹¹ Of these, 75.5 acres of impacts to wetlands will be caused by construction in temporary workspaces. Draft EIS at 4-62. Constitution has not justified its intention to site so much temporary workspace in wetlands. In order to be able to evaluate whether impacts to wetlands will be avoided to the greatest extent possible or adequately mitigated, the Commission should require Constitution to provide site-specific analysis for each proposed temporary workspace. Absent such analyses, the Commission's review of the Project's impacts to wetlands remains incomplete.</p> <p>The Draft EIS's review of impacts to wetlands also is incomplete because not all wetlands within the Project area have been delineated. The U.S. Army Corps' Public Notice for Constitution's application for a permit under Section 404 of the Clean Water Act authorizing discharge of fill into wetlands identifies 21 percent of the pipeline as unsurveyed. intervenors, along with the Corps, had previously requested that the Commission defer any decision on the Project until all outstanding wetlands delineation surveys are complete. Constitution has requested that the Corps authorize its proposed filling of wetlands prior to the completion of such surveys. This request should be rejected. A full delineation of all wetlands that could be affected by the Project must be completed and made available for public review and comment before any Project authorizations are granted.</p> <p>In addition, the Draft EIS contemplates allowing Constitution to determine the method of pipeline construction through wetlands at the time of construction. This approach flies in the face of NEPA's mandate to assess impacts before committing to a particular path. Absent an</p>

¹¹ The U.S. Army Corp has identified 152 acres of affected wetlands (128.35 acres of temporary impacts and 24.54 acres of permanent impacts). U.S. Army Corps of Eng'rs, Comments on Draft EIS for Constitution Pipeline Project, FERC Docket No. CP13-499-000 (filed Apr. 7, 2014).

CO41-14

As stated in section 4.4.4 of the EIS, the FERC Procedures and Constitution's state-specific ECPs specify that extra workspaces should not be within 50 feet of wetlands except where an alternative measure has been requested by Constitution and approved by the FERC. Areas where Constitution has requested extra workspace and stated that a 50-foot setback from wetlands is infeasible (including its site-specific justifications) are identified in appendix D of the EIS. We have reviewed these exceptions and deem them acceptable. See the response to comment FA4-3 regarding un-surveyed areas. Constitution proposed a crossing method for each wetland that would be impacted by the proposed pipeline (appendix L of the EIS) based on expected conditions. However, the exact construction method would be confirmed at the time of construction because soil moisture conditions at crossings cannot be determined in advance. If Constitution ultimately proposed changing a wetland crossing from a trenchless method to a trenched method, then the FERC and applicable agencies would have to review and approve the proposal. As stated in section 4.4.4 of the EIS, PEM and PSS wetland vegetation would regenerate quickly, typically within 1 to 3 years, and emergent wetlands would not be subject to vegetation maintenance. We have decades of extensive experience observing and assessing rights-of-way and we have found that PEM and PSS wetlands can be adequately restored following construction. Temporary impacts on PFO wetlands would be long-term outside the maintained corridor, because woody vegetation would take several years to regenerate and permanent within the maintained corridor.

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CO41-14 cont'd	<p>analysis of construction methods for wetlands crossings, a meaningful review of the Project's impacts is not possible. If Constitution demonstrates that determining the appropriate construction method in advance of actual construction is infeasible, then the Commission should base its analysis of significance of impacts to wetlands on an assumption of the worst-case scenario whereby construction methods with the greatest level of impact are assumed. As discussed above, the Commission also should evaluate the feasibility of trenchless crossing methods for each proposed wetland crossing rather than simply defaulting to open cut trench crossing methods. NYSDEC has recommended that the trenchless crossing technique horizontal directional drilling be utilized for all wetland crossings.¹² Intervenor agree.</p> <p>The Draft EIS assumes that impacts to wetlands would be minor and temporary because the majority of these impacts would occur within temporary workspaces and would "therefore return to pre-construction conditions following construction." Draft EIS at 4-62. This conclusion is unsupported by the information presented by Constitution and included in the Draft EIS. As discussed above, the assumption that construction areas outside of the permanent right-of-way will return to pre-construction conditions ignores the reality that the heavy-duty construction activities utilized to install a pipeline of this scale, even if short-lived, can cause long-term impacts. Before determining whether the Project will cause significant adverse effects to wetlands and wetland buffers, the Commission must evaluate site-specific impacts and impact avoidance, minimization, or mitigation measures.¹³ The public must be given the opportunity to review and comment on such evaluations.</p>
CO41-15	<p>Groundwater Contamination</p> <p>As discussed in Intervenor's Application Comments, the Project presents the risk that construction activities could intersect the water table, thereby threatening ground and surface drinking water resources. While the Draft EIS recognizes this possibility, the concomitant impacts are dismissed as "minor" and "temporary." Draft EIS at 4-40. The measures identified to mitigate impacts to groundwater resources do not address the possibility of local aquifer contamination or drawdown of local water table elevations.</p> <p>In addition, while the Draft EIS identifies restrictions on herbicide use within a certain distance of waterbodies and wetlands, it affords no protection to groundwater resources from potential herbicide contamination during construction and pipeline maintenance. Intervenor also had requested that the Commission's analysis include a complete list of all potentially impacted private wells; Constitution has yet to identify all potentially impacted wells.</p> <p>Of particular concern, the Pipeline Project would cross approximately four miles of the Clinton Street Ballpark Aquifer, a sole source aquifer and drinking water supply for approximately 111,000 people in Broome County, New York.¹⁴ In addition, the Project would</p> <p>¹² NYSDEC, Preliminary Comments on Notice of Application for Constitution Pipeline Company, LLC (Project) 3, FERC Docket No. CP13-499-000 (filed July 17, 2013).</p> <p>¹³ This evaluation must include quantification of impacts to 100-foot wetland buffer areas, which are largely ignored in the Draft EIS.</p> <p>¹⁴ U.S. EPA, Clinton Street Ballpark Aquifer System, http://www.epa.gov/region2/water/aquifer/clinton/clinton.htm#18 (last visited Apr. 4, 2014).</p>

CO41-15

As stated in section 4.3.2.1 of the EIS, the pipeline trench would be excavated to a depth of 6 to 8 feet in most cases. The proposed pipeline would cross approximately 6.4 miles of surficial aquifers which have depths less than 8 feet (table 4.3.1-1). As discussed in section 4.3.2.1, Constitution would avoid or further minimize impacts by using construction techniques described in its site-specific ECPs, such as using temporary and permanent trench plugs and interceptor dikes. See the response to comment LA8-1 regarding herbicide use. Excavation of the trench would not result in consumptive use of groundwater; therefore, we do not expect drawdowns of local aquifers to occur. The discussion regarding the Clinton Street Ballpark Aquifer in section 4.3.2.1 of the EIS has been updated.

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cross surface waterbodies within the recharge area for the aquifer, Draft EIS at 4-37, and, according to the U.S. Environmental Protection Agency (“EPA”), the aquifer is “susceptible to contamination through several mechanisms.”¹⁵ Nevertheless, the Draft EIS includes no meaningful analysis of the Project’s effect on this important resource. The Draft EIS states that “EPA indicated that [it] would not require a detailed review of potential impacts on the Clinton Street Ballpark [Aquifer] for the projects because no federal funding would be involved.” *Id.* at 4-42. The presence or absence of funding for a particular resource does not bear on the necessity for analysis under NEPA. Moreover, reliance on a generic discussion of impacts to water resources and on non-site-specific best management practices is insufficient. The Draft EIS must include an assessment of the specific threats to the Clinton Street Ballpark Aquifer and of measures to avoid, minimize, or mitigate those threats.

CO41-16

Erosion and Sedimentation

While the Draft EIS identifies the increase in sediment mobilization that can be expected to result from Project construction activities, it dismisses these impacts as merely temporary, thus discounting their significance. Draft EIS at 4-54–4-58. The Draft EIS ignores the potential for lasting erosion and sedimentation impacts to be caused by the conversion of hundreds of acres of forests to open land.

As discussed in the Meliora Report, temporary erosion controls cannot protect against accelerated erosion that will continue after the completion of construction due to the exposure of soils to direct rainfall following vegetation clearing and the reduction of compacted soils’ ability to absorb rainwater—both of which cause an increase in stormwater runoff volumes and velocities. Areas with steep slopes, miles of which are crossed by the Pipeline Project, Draft EIS at 4-14, are especially vulnerable to accelerated erosion as a result of construction. Following “temporary” disturbances in Project workspaces, areas that have been cleared of vegetation to accommodate heavy-duty construction equipment and that have suffered soil compaction by such equipment will not return to pre-construction conditions overnight. Right-of-way cleared through forested steep slope areas will permanently alter stormwater flow.

The Draft EIS includes no meaningful evaluation of the effect of stormwater runoff caused by the Project. The Draft EIS notes that the best management practices (“BMPs”) identified in Constitution’s Environmental Construction Plans (“ECPs”) will protect against increased erosion and sedimentation, but fails to conduct an analysis of the adequacy of the individual BMPs or to recommend additional stormwater mitigation measures. Constitution’s attempt to have its ECPs serve as the Stormwater Pollution Prevention Plan (“SWPPP”) for the Project should be rejected. Construction plans are no substitute for a SWPPP, which focuses specifically on detailed stormwater evaluation and control measures.¹⁶ In order to protect against the water quality degradation that results from erosion and sedimentation, the Commission must

¹⁵ *Id.*

¹⁶ Indeed, NYSEDEC called for the inclusion of a SWPPP “as an appendix to the draft EIS, describing the proposed erosion and sediment control practices and, where required, post-construction stormwater management practices, that will be used and constructed to reduce the pollutants in stormwater discharges.” NYSEDEC, Comments on the Scope of Environmental Impact Statement for the Constitution Pipeline Project 2–3 (Nov. 7, 2012), FERC Docket No. PF12-9-000.

CO41-16

Constitution and Iroquois would both implement sediment and erosion controls based upon our Plan and Procedures as well as other proposed measures (such as their stormwater pollution prevention plans) to prevent negative effects of erosion and stormwater runoff. These measures are described in sections 2.3 and 4.3 of the EIS and in Constitution’s Plan. A description of the sediment and erosion control measures, as well as construction plans, can be reviewed in Constitution’s ECPs at http://elibrary.ferc.gov/0/idmws/file_list.asp?document_id=14160901.

Constitution’s Plan requires the inspection and maintenance of temporary erosion control measures at least on a daily basis in areas of active construction or equipment operation, on a weekly basis in areas with no construction or equipment operation, and within 24 hours of each 0.5 inch rainfall event. These plans include measures to ensure revegetation of workspaces and avoid impacts from runoff during operation.

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include a full analysis of potential stormwater impacts and attach a complete SWPPP in a revised draft EIS. This analysis should describe how the pipeline construction schedule will be phased to coordinate with control measures contained in the SWPPP and should consider alternative construction practices that can be used to avoid or reverse soil compaction and thereby prevent runoff volume.

CO41-17

C. Analysis of Forest Ecosystem Impacts Is Inadequate.

Kevin Heatley, a restoration ecologist with expertise in invasive species management, has submitted a report (“Heatley Report”) (annexed as Exhibit B hereto) that identifies a number of serious problems in the Draft EIS, based on his over 20 years of experience in natural resources management. As his report explains, the Draft EIS dramatically underestimates the scope of the Project’s impact on interior forest and on the species that rely on interior forest habitat for their survival. The Heatley Report also identifies crucial information that is missing from the Draft EIS, points out shortcomings of the Invasive Species Management Plan, and questions the failure of the Draft EIS to analyze the ecosystem-level impacts of the Project when construction activities along the entire length of the Project and disturbances to individual tracts of land are considered cumulatively. These errors and omissions raise serious questions about the adequacy of the Draft EIS.

Loss of Interior Forest Habitat

The Draft EIS calculates the scope of impacts on interior forests by simply measuring the area of interior forest in which Constitution has proposed to conduct construction activities. This methodology ignores the fact that by creating corridors through once-intact forest blocks, areas of the forest adjacent to those corridors (300 feet on either side) in which no construction activities are proposed will, nevertheless, be affected by the construction because they will be converted from interior forest to edge habitat. These areas of once-interior forest should be included in the Commission’s calculation of acreage affected by construction and operation of the proposed Projects.

In addition to the significant underestimation of impacts to interior forests, the Draft EIS lacks any real evaluation of ways that these impacts could be avoided, minimized, or mitigated. Instead, the Commission has requested that Constitution provide a draft Upland Forest Mitigation Plan before the close of the Draft EIS comment period. Draft EIS at 4-71. Even using Constitution’s too-low calculation of interior forest impacts, the Draft EIS states that impacts on the habitat and the migratory birds and other wildlife that use this habitat still account for 42.9 percent of the total forest impacts and 23.6 percent of the total Project impacts. Barring the public from weighing in on the plan that determines the level of harm to which birds and wildlife will be subject flies in the face of NEPA’s public participation goal. In order to satisfy NEPA’s mandates, the Commission must issue a revised draft EIS that analyzes the Upland Forest Mitigation Plan, along with the other various outstanding materials and analyses, and should provide the public with the opportunity to review and comment on the revised draft EIS and the underlying information analyzed therein.

CO41-17

See the responses to comment CO26-14 and comment CO9-2.

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CO41-18	<p>Soil Compaction</p> <p>As discussed above, the Draft EIS contemplates soil compaction testing in only 1.6 percent of the total area of Project disturbance. Absent soil testing in all previously forested areas that are cleared for use as “temporary” workspaces, the restoration of the cleared areas to pre-construction conditions cannot be guaranteed. The heavy-duty earth-moving equipment used to dig the pipeline trench and install the pipe itself will compact soils in these areas, thus reducing the soils’ ability to support vegetation.</p> <p>The Heatley Report echoes the recommendations contained in the Meliora Report relating to soil compaction testing and mitigation. Namely, in order for Constitution to restore soils affected by construction and to revegetate lands that were cleared to allow for construction, it must expand the scope of its proposed soil compaction testing and evaluate the need for subsurface soil decompaction measures along the entire length of the pipeline.</p>
CO41-19	<p>Bats</p> <p>As discussed in Intervenor’s comments on the Application, tree-clearing associated with Project construction and the resulting forest fragmentation causes negative impacts to wildlife. As the Draft EIS recognizes, 23 species that are state-listed as threatened, endangered, or of special concern were identified as potentially present in the Pipeline Project area. Draft EIS at 4-98. Four of these species are also federally listed. <i>Id.</i> Constitution has yet to complete the required surveys for all of these species or to submit all of the necessary mitigation plans. Draft EIS at 4-102. Nevertheless, the Draft EIS concludes that the Project will not cause any adverse impacts on any of these species. <i>Id.</i> at 4-105.</p> <p>With respect to the federally-listed Indiana bat, Constitution’s consultants conducted surveys for Indiana bats and other target bat species along portions of the proposed route in Susquehanna County, Pennsylvania. While surveyors commissioned by Constitution did not capture any Indiana bats within the immediate Project area, the failure to detect individual animals of an endangered species that is facing the additional stress of white-nose syndrome is unsurprising and does not support a finding that the Project will not adversely impact this already imperiled species. No surveys for any bat species were conducted along the 99.2 miles of proposed pipeline route in New York State.</p> <p>In addition to the Project’s impact on Indiana bats and their habitat, other bat species could be affected by Project construction activities. According to the Draft EIS, three special-status bat species are present with this proposed Project area—namely, the small-footed bat (<i>Myotis leibii</i>), listed as threatened in Pennsylvania and as a species of special concern in New York; the Northern (long-eared) myotis bat (<i>Myotis septentrionalis</i>), proposed for federal listing as endangered and listed as a Pennsylvania species of special concern; and the silver-haired bat (<i>Lasiurus noctivagans</i>), listed as a Pennsylvania species of special concern. Constitution’s mist netting surveys in Pennsylvania resulted in the capture of Northern myotis and silver-haired bats. In addition, the little brown bat (<i>Myotis lucifugus</i>), currently under review by U.S. FWS for potential listing, was captured. Nevertheless, the Draft EIS failed to evaluate the impact of the Project on those species of concern. Instead, the Commission has recommended only that</p>

CO41-18

See the response to comments CO1-4 and CO41-10 regarding compaction. In addition, after construction Constitution and Iroquois would conduct follow-up inspections of all disturbed upland areas after the first and second growing seasons to document the success of restoration. Constitution would be required to continue restoration efforts beyond the second growing season if the disturbed area has not been properly restored. The FERC would also conduct long-term monitoring inspections of the projects following construction and require additional restorative measures until revegetation is deemed complete.

CO41-19

As stated in our February 20, 2014 letter to the FWS, our conclusion was based upon “the information supplied in Constitution’s biological survey reports, subsequent filings received from Constitution, our analysis of the potential effects of the proposed action as reported in the EIS, and our coordination with the FWS”; not merely on a survey report with negative findings. Based on that information, we determined that the project *is not likely to adversely affect* the Indiana bat, dwarf wedgemussel, and northern monkshood. As indicated in section 4.7.2 of the EIS, the FWS stated that bat surveys were not required within the New York portion of the project. However, based on adherence to our recommendation to develop additional mitigation measures in consultation with the FWS and the PGC, as well as our recommendation in section 4.5 to develop an upland forest mitigation plan, we conclude that construction and operation of the project would not result in adverse impacts on sensitive bat species. These mitigation measures would be available for review by the public on our e-Library system. See the response to comment FA4-41 regarding the northern long-eared bat.

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Constitution develop impact avoidance, minimization, or mitigation measures prior to construction.

Despite the fact that the small-footed bat is a New York species of concern and the Northern myotis bat has been proposed for federal listing as endangered, Constitution did not conduct any bat surveys along the 99.2-mile portion of the Pipeline Project in New York State. The cursory look at the potential impacts on vulnerable bat populations contained in the Draft EIS is insufficient to satisfy NEPA's requirement. The Commission should require bat surveys for the entire length of the proposed Project route and for each alternative route. Only once the Commission gathers the information necessary to determine whether these species are likely to be present in the Project area can it begin to evaluate the impacts of Project construction and operation activities on those species.

If any of the special status bat species are found in the vicinity of the Project, mitigation measures to protect these already stressed populations from further harm must be developed and required as a condition of the Certificate. For example, Indiana bats and Northern long-eared bats are known to roost in trees during certain months;¹⁷ tree clearing during those months, therefore, should be prohibited. Small-footed bats, on the other hand, are known to utilize rocky outcroppings as their spring and summer habitat. If surveys detect members of this species in the vicinity of the Project, potential habitat sites along the construction right-of-way should be identified and construction restrictions put in place to avoid disturbance of such areas. The Draft EIS includes no analysis of such mitigation measures and, instead, suggests that they will be included in Constitution's Upland Forest Mitigation Plan. As discussed above, the Commission must revise its Draft EIS to analyze the mitigation plan and must allow for public review and comment on the revised draft.

CO41-20

Migratory and Resident Birds

As discussed in more detail in the Heatley Report and in the comments submitted by the Delaware-Otsego Audubon Society,¹⁸ the fragmentation of blocks of intact forest habitat will cause major negative impacts on nesting forest bird species, the populations of which are already in decline. Indeed, the Draft EIS recognizes that "[t]he loss of interior forest habitat could result in mobile species permanently populating adjacent habitats which could increase competition and stress on a long-term basis." Draft EIS at 4-83. However, rather than analyzing the harm caused by such long-term stress, the Draft EIS, instead, offers the conflicting conclusion that "[o]verall construction impacts on migratory birds would be short-term as birds would move into adjacent undisturbed habitats." *Id.* The Draft EIS presents no support for this statement. Similarly, the attempted comparison between negative impacts to certain species and positive impacts to others—"the creation of additional edge habitat could benefit certain species by providing travel corridors and additional forage habitat," *id.*—does nothing to further the

¹⁷ U.S. FWS, Indiana bat (*Myotis sodalis*) Draft Recovery Plan: First Revision (April 2007), available at http://ecos.fws.gov/docs/recovery_plan/070416.pdf; U.S. FWS, 12-Month Finding on a Petition to List the Eastern Small-Footed Bat and the Northern Long-Eared Bat as Endangered or Threatened Species, Listing the Northern Long-Eared Bat as an Endangered Species, 78 Fed. Reg. 61,046 (Oct. 2, 2013).

¹⁸ Delaware-Otsego Audubon Society, Comments on Draft Environmental Impact Statement for Constitution Pipeline and Wright Interconnect Projects, FERC Docket No. CP13-499-000 (filed Mar. 27, 2014).

CO41-20

See the response to comments FA4-29, FA4-30, and CO26-14.

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CO41 – Earthjustice (cont'd)

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CO41-20 cont'd	<p>understanding of the real impacts that will be suffered by those species that rely on interior forest habitat. In order to evaluate the significance of the adverse impacts to resident and migratory bird species, the Commission must revise its calculations and consider the full scope of the Project's elimination of interior forest habitat.</p> <p>The only mitigation measure that the Commission has suggested that would be protective of interior-dwelling bird species is the co-location of the Project along existing rights-of-way. <i>Id.</i> Unfortunately, the proposed Project route parallels existing right-of-way for only nine percent of its total length. Draft EIS at 4-84. (Alternative M proposes an additional 30.4 miles of co-location, for an approximate total of twenty-three percent of the pipeline's length. Draft EIS at 3-34–3-38.) The Draft EIS suggests that mitigation measures for birds will be included in the forthcoming Upland Forest Mitigation Plan. As discussed above, these mitigation measures should be evaluated in a revised draft EIS that is issued for additional public review and comment.</p>
CO41-21	<p>D. Analysis of Air Quality and Climate Change Impacts Is Inadequate.</p> <p>As discussed below, the Draft EIS dramatically underestimates the extent to which Project construction and operation will emit air pollutants and fails to present a comprehensive analysis of the direct, indirect, and cumulative effects of the Project on air quality.</p> <p><i>Direct and Indirect Air Impacts</i></p> <p>The Draft EIS acknowledges that construction and operation of the proposed projects will result in significant emissions of various air pollutants, including NO_x, VOCs, carbon monoxide, particulate matter, sulfur dioxide, and GHGs, particularly methane. These pollutants affect air quality—and therefore human health—in a variety of ways. NO_x is a precursor of both ozone and fine particulate matter ("PM_{2.5}").¹⁹ VOCs are also an ozone precursor.²⁰ Fine particulate matter is linked to increased heart attacks, aggravated asthma and decreased lung function, and for people with heart or lung diseases, premature death.²¹ Ozone exposure can lead to coughing, chest pain, and throat irritation.²² It also worsens bronchitis, emphysema, and asthma, and can reduce lung function.²³ The most common hazardous air pollutants associated with natural gas development are n-hexane and the "BTEX compounds" benzene, toluene, ethylbenzene, and xylenes.²⁴ Benzene is a known human carcinogen, and formaldehyde, which is also emitted from natural gas operations, is a probable human carcinogen.²⁵ Methane is a</p> <p>¹⁹ U.S. EPA, <i>Nitrogen Dioxide</i>, available at http://www.epa.gov/air/nitrogenoxides/ (last visited Apr. 4, 2014).</p> <p>²⁰ U.S. EPA, <i>Ozone – Good Up High Bad Nearby</i>, available at http://www.epa.gov/oar/oaqps/gooduphigh/bad.html (last visited Apr. 4, 2014).</p> <p>²¹ U.S. EPA, <i>Particulate Matter (PM)</i>, available at http://www.epa.gov/pm/health.html (last visited Apr. 4, 2014).</p> <p>²² U.S. EPA, <i>Ozone – Good Up High Bad Nearby</i>.</p> <p>²³ <i>Id.</i></p> <p>²⁴ Oil and Natural Gas Sector: New Source Performance Standards and National Emission Standards for Hazardous Air Pollutants Reviews, 76 Fed. Reg. 52,738, 52,745 (Aug. 23, 2011).</p> <p>²⁵ <i>Id.</i> at 52,791.</p>

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Air quality is discussed in section 4.11.1 of the EIS. The Clean Air Act (CAA) is the basic federal statute governing air pollution in the United States. The CAA established National Ambient Air Quality Standards (NAAQS) to protect the health and welfare of the public. Primary standards are the limits set for maximum exposure to a pollutant by sensitive public groups including asthmatics, children and the elderly. The NAAQS are set and periodically reviewed by the EPA based on a rigorous scientific process. As required by the CAA, each state prepares a federally enforceable state implementation plan (SIP), which describes how that state will meet these NAAQS. Each state can tailor its SIP to its unique air pollution concerns, but all have the basic purpose of implementing and enforcing regulations such that the air quality in the state meets the NAAQS.

The EIS presents estimated emissions for the construction and operational project phases using appropriate EPA models as described in section 4.11.1.3. Section 4.11.1.2 lists the potentially relevant laws and explains how the project will comply with all applicable requirements, or if additional mitigation is needed.

Projected construction and operational emissions for the Constitution pipeline and Wright Interconnect Project are described in relation to the various state and federal permitting requirements, which are designed to be protective of human health including construction workers and members of the nearby communities. Ozone is discussed in section 4.11.1 of the EIS. Because the projected levels of NO_x approached the regulatory threshold of 100 tons per year (tpy), we recommended that the Applicants should each file for review and written approval a Construction Emission Plan identifying how they would track their construction schedules for the respective components of the projects within Schoharie County (which is within a nonattainment area for ozone) and ensure construction emissions of NO_x would remain under the General Conformity applicability threshold. Subsequent to the filing of the draft EIS, Constitution recalculated its estimated construction emissions and reported that it was revising downward its original estimate of 97 tpy of NO_x to approximately 70 tpy. See the response to comment FA6-14. Given these new data, we conclude that a Construction Emission Plan is no longer needed.

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CO41-21 cont'd	<p>potent GHG, which the Intergovernmental Panel on Climate Change (“IPCC”) estimates to have 34 times the global warming potential (“GWP”) of carbon dioxide (“CO₂”) over a 100-year period.²⁶</p> <p>The Commission largely dismisses the impacts of air pollution generated by the construction and operation of the Pipeline Project and of the Wright Interconnect Project because “emissions during construction would be temporary and would be minimized by mitigation measures” Draft EIS at 4-168. This approach ignores the fact that the estimated emissions from construction substantially exceed the tons-per-year threshold for major sources for multiple of the pollutants emitted, including NO_x, VOCs, CO, and PM. <i>Id.</i> Moreover, the Draft EIS includes no analysis of the potential health effects to workers and members of the community who live nearby and who may be at risk of exposure to harmful air pollutants.</p> <p>FERC’s failure to undertake a meaningful analysis of the effects of emissions from Project construction and operation is particularly concerning, given that Pennsylvania and New York are located in the Northeast Ozone Transport Region (“OTR”) and the proposed construction would result in significant emissions of NO_x and VOCs. Draft EIS at 4-168. The Project area is already a moderate ozone nonattainment area for VOCs and NO_x for New Source Review permitting purposes. Draft EIS at 4-160. With the exception of a brief section exploring whether this non-attainment status for VOCs and NO_x triggers a general conformity requirement, <i>id.</i> at 4-165, the Draft EIS does not undertake any analysis of the potential impacts on workers and residents of emissions of ozone-generating pollutants in an area which is already considered non-attainment for those pollutants.²⁷</p> <p>In addition, the Draft EIS fails to adequately address fugitive emissions from the proposed Projects. The Commission asserts that fugitive emissions from the operation of the proposed pipeline are “considered negligible,” Draft EIS at 4-168, but fails to provide any basis for this conclusion. In particular, the Commission provides no analysis of potential malfunctions of either pipeline or compressors that could lead to unintended emissions of various pollutants. This is a significant oversight, given that the U.S. Department of Transportation’s Pipeline and Hazardous Materials Safety Administration (“PHMSA”) reports 291 significant pipeline incidents in 2013 alone.²⁸ These data make clear that spills, explosions, and other unintentional releases of pollutants from pipelines occur with a measurable and predictable frequency. The resulting—and equally predictable—emissions should be taken into account as part of the Commission’s assessment of the impacts of the proposed Projects.</p> <p>²⁶ Working Group I Contribution to the IPCC Fifth Assessment Report, Climate Change 2013: The Physical Science Basis 8-58 (June 7, 2013), <i>available at</i> http://www.climatechange2013.org/images/uploads/WGLAR5_WGI-12Doc2b_FinalDraft_All.pdf.</p> <p>²⁷ Intervenor note that Table 4.11.1-6 appears to contain an error with respect to the NO_x emissions resulting from the operation of the proposed Wright Compressor Station. The table indicates that the facility’s existing Solar Taurus 60 Turbines emit 551.6 tpy of NO_x.</p> <p>²⁸ U.S. DOT, PHMSA, Significant Pipeline Incidents, http://primis.phmsa.dot.gov/comm/reports/safety/signpsi.html (last visited Apr. 4, 2014). Significant pipeline incidents are defined as those that involve a fatality or injury, \$50,000 or more in total costs, highly volatile liquid releases of five barrels or more or other liquid releases of fifty barrels or more, or liquid releases resulting in an unintentional fire or explosion.</p>
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Fugitive emissions and mitigation measures are also discussed in section 4.11.1. We have updated this section regarding methane leakage and venting that may occur during operation of the pipeline and the expanded compressor station. Explosions and other similar unintentional releases would vary widely and be subject to numerous factors and so were not included in our analyses. We have updated the EIS to indicate that such releases are possible.

Under the CEQ guidance regarding climate change impact of GHGs, if an action has annual direct emissions greater than 25,000 metric tons per year, then the agency “should consider this an indicator that a quantitative and qualitative assessment may be meaningful for decision makers.” As stated in this guidance “CEQ does not propose that this is an indicator of a threshold of significant effects, but rather as an indicator of a minimum level of GHG emission that may warrant some description in the appropriate NEPA analysis for agency actions involving direct emissions of GHGs.” The CEQ recommends that environmental documents “reflect the global context” of climate change and provide useful information. The methodology of comparing an individual project’s GHG emissions to total U.S. emissions is standard practice in NEPA documents, and is supported by CEQ guidance: “Because climate change is a global problem that results from global GHG emissions, there are more sources and actions emitting GHGs (in terms of both absolute numbers and types) than are typically encountered when evaluating the emissions of other pollutants. From a quantitative perspective, there are no dominating sources and fewer sources that would even be close to dominating total GHG emissions. The global climate change problem is much more the result of numerous and varied sources, each of which might seem to make a relatively small addition to global atmospheric GHG concentrations. The CEQ proposes to recommend that environmental documents reflect this global context and be realistic in focusing on ensuring that useful information is provided to decision makers for those actions that the agency finds are a significant source of GHGs.” Council on Environmental Quality. 2010. Draft NEPA Guidance on Consideration of the Effects of Climate Change and Greenhouse Gas Emissions, February 18, 2010.

As mentioned above, operation of the pipeline and the compressor station (combustion, vented and fugitive emissions) would result in GHG emissions of 175,000 tpy. This is only 0.003 percent of total U.S. GHG emissions, and even less for global GHG emissions. This provides decision makers the context for making an informed decision on this project.

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The Draft EIS fails to undertake a meaningful analysis of the climate change impacts of the GHG emissions, including fugitive emissions of GHGs, which would result from the construction and operation of the proposed projects. The Commission acknowledges that emissions of GHGs from the operation of the Wright Compressor Station after the proposed modifications take place will be significant enough to make the station a major source of GHGs requiring a Title V permit. Draft EIS at 4-173. For other pollutants that the Projects' operation will generate, the Commission appears to have relied on the fact that major source thresholds would not be exceeded as a basis for finding that there would be no significant air impacts. Draft EIS at 4-168. Yet, inexplicably, with respect to GHGs, the Commission gives no weight to the fact that the Wright Compressor Station would become a major source. Instead, the Commission compares the estimated GHG emissions from the construction and operation of the proposed projects to the entire GHG inventory for the United States and simply dismisses the emissions as unimportant. Under this methodology, the more GHGs contributed by Commission-jurisdictional projects over time, the less likely the Commission is to consider new emissions significant—until we reach a catastrophic tipping point, when it will be too late to avoid or mitigate impacts. Such an outcome is precisely what NEPA is intended to prevent.

The Draft EIS concludes, without pointing to any evidence in support of its conclusion, that there would be negligible emissions of GHGs from pipeline operation. Draft EIS at 4-170. As discussed above, this conclusion fails to take into account the statistical likelihood of a significant incident with the pipeline, resulting in a spill, leak, explosion or other unintended emission. In order to satisfy its obligations under NEPA, the Commission must consider the possibility of such unintended emissions of a highly potent GHG.

Intervenors note that, while the Draft EIS does appear to take some account of fugitive GHG emissions that are and will be generated by the operation of the Wright Compressor Station, the figures it uses are so low that they seem unlikely to be accurate. The Draft EIS uses 66 tons per year of CO₂ equivalent ("CO₂e") as its value for existing and projected future fugitive GHG emissions from the compressor station. Draft EIS Table 4.11.1-6. Other analyses of fugitive emissions from natural gas operations, and from compressor stations in particular, have found much higher levels of fugitive emissions. For example, a recent University of Texas study of fugitive methane emissions generated by the natural gas industry found that compressor stations emitted 106 to 212 tonnes of fugitive methane emissions per year, which equates to somewhere between 2,200 and 4,452 tons of CO₂e per year.²⁹ Even taking into account the margins of error associated with those results, 66 tpy of CO₂e is dramatically lower than what has typically been seen in the industry. In order to satisfy NEPA's hard look standard, the Commission must reexamine the estimates for fugitive emissions and ensure an accurate reflection of the current and future real-world operating conditions of the facility. In particular, the Draft EIS appears only to look at fugitive emissions from dry seals. Draft EIS Table 4.11.1-6. The Draft EIS fails to discuss whether there are any wet seals or blowdown vent lines that are or will be operating at the compressor station, since these have been found generally to create significantly more fugitive emissions than dry seals.³⁰

²⁹ Natural Gas Industry Methane Emission Factor Improvement Study Final Report, prepared by researchers at University of Texas at Austin and URS Corporation for Lisa Hanle, U.S. EPA, at 12 (December 2011), *available at* http://www.utexas.edu/research/ccer/GHG/files/FReports/XA_83376101_Final_Report.pdf.

³⁰ See, e.g. *id.* at 14, 37.

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CO41-22	<p>Cumulative Impacts on Air Quality</p> <p>The Draft EIS’s analysis of the cumulative impacts of the proposed Projects on air quality, when added to the impacts of other past, present, and reasonably foreseeable future projects, is insufficient and amounts to little more than a regurgitation of its insufficient analysis of direct and indirect air quality impacts. Draft EIS at 4-229–4-230. The Draft EIS contains none of the required analysis of what the <i>cumulative</i> impact of the Projects would be <i>together</i> with the impacts of other projects. Indeed, the Draft EIS notes that the analysis contained therein is focused on the question whether the proposed Projects by themselves “would add significantly to the long-term cumulative impact of other projects.” <i>Id.</i> at 4-229. This statement reflects a misunderstanding of the legal standard—namely, whether the proposed Projects <i>together with</i> other projects will <i>cumulatively</i> have a significant impact.</p> <p>The Draft EIS fails to include in its cumulative impacts analysis any meaningful consideration of the impacts of several ongoing or planned projects that will emit air pollution at the same time and in the same geographic areas as the Constitution pipeline. These projects are: (1) the expansion of the William Field Services Co. Central Compressor Station; (2) the Williams Miller Compressor Station; (3) the Williams Reynolds Pipeline; (4) the Williams White Road M&R station; and (5) the Southwestern, Sutton Road M&R Facility and Lateral. Draft EIS at 4-215. Although it is somewhat unclear exactly to what extent the Commission has calculated the potential emissions from these projects and included them in its cumulative impacts analysis, the Draft EIS discounts the impacts of these projects. For example, the Commission attempts to justify its decision not to evaluate the impacts of the Williams Central Compressor Station with the assertion that the facility “would be completed whether or not the proposed projects are constructed.” Draft EIS at 4-216. This reasoning ignores the very purpose of a cumulative impacts analysis. In this case, even if it is true that these other projects, which the Draft EIS refers to as “non-jurisdictional project-related facilities,” are not causally related to the proposed Projects, their impacts must be evaluated as part of a cumulative impacts analysis.</p>
CO41-23	<p>E. Analysis of Indirect Impacts Is Inadequate.</p> <p>While the Draft EIS discusses—albeit inadequately—direct impacts on a range of resources crossed by the Project or within its construction footprint, it includes no analysis of the Project’s indirect impacts, especially induced industrial growth—<i>e.g.</i>, those impacts to the environmental that will result from new gas development caused by the Project and from the installation and operation of a new gas distribution system that will be caused by the Project.</p> <p>As compared to direct effects, which are those “caused by the action and occur at the same time and place,” indirect effects are those impacts that are caused by the action, but occur “later in time or farther removed in distance, but are still reasonably foreseeable.” 40 C.F.R. § 1508.8. Indirect impacts may include “growth inducing effects and other effects related to induced changes in the pattern of land use, population density or growth rate, and related effects on air and water and other natural systems, including ecosystems.” <i>Id.</i></p> <p>The inducement of future gas development along the pipeline route is an indirect effect of the pipeline’s construction and operation that must be evaluated in the Commission’s environmental review of the Project. Such development is fairly understood as being indirectly</p>

CO41-22

See the response to comment SA6-8 regarding updates to the cumulative impacts section. Existing compressor stations have undergone the state and federal permit and mitigation process. Emissions from any recently constructed or reasonably foreseeable compressor stations are discussed in section 4.13.6.10 of the EIS. We have updated section 4.13.6.10 to indicate that emissions from existing and proposed compressor stations in the region as listed in table 4.13-1 may be similar to those as described in section 4.11.1 for the Wright Interconnect Project and that potential impacts would be minimized or mitigated in accordance with the PADEP or the NYSDEC permitting requirements.

CO41-23

See the response to comments FA4-45, LA1-4, and CO26-11. The specifics of future industrialization of the area is speculative. However, any future industrial development would be subject to the appropriate federal, state, and county/township regulations which may include local zoning ordinances or other restrictions. See the response to comment FA4-46 regarding the Leatherstocking project.

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caused by the availability of infrastructure to transport the gas to market. *See, e.g., City of Davis v. Coleman*, 521 F.2d 661, 677 (9th Cir. 1975) (EIS for highway project needed to analyze impact of induced development despite uncertainty about pace and direction of development); *Natural Res. Def. Council, Inc. v. Fed. Aviation Admin.*, 564 F.3d 549 (2d Cir. 2009) (agency properly considered indirect and cumulative impacts of induced growth caused by construction of new airport); *Border Power Plant Working Grp. v. Dep't of Energy*, 260 F. Supp. 2d 997, 1012–18 (S.D. Cal. 2003) (NEPA required agency review of air emission impacts from Mexican power plants as part of EIS for transmission line project in California that indirectly caused such emissions).

Such development is reasonably foreseeable given the demand for gas drilling in the Marcellus shale region, the proposal to permit high-volume hydraulic fracturing (“HVHF”) of gas wells in New York, and the likelihood that HVHF wells will be required to connect to existing infrastructure to ensure green completions. *See, e.g., Sierra Club v. Marsh*, 976 F.2d 763, 767 (1st Cir. 1992) (future impacts are reasonably foreseeable if they are “sufficiently likely to occur that a person of ordinary prudence would take them into account when reaching a decision.”); *Mid States Coal. for Progress v. Surface Transp. Bd.*, 345 F.3d 520 (8th Cir. 2003) (environmental effects of increased coal consumption due to construction of a new rail line to reach coal mines was reasonably foreseeable and required evaluation under NEPA); *Native Village of Point Hope v. Salazar*, 730 F. Supp. 2d 1009, 1017 (D. Alaska 2010) (requiring consideration of induced development of natural gas drilling in EIS for offshore oil and gas lease sale that caused the gas development).

As intervenors pointed out in their comments on Constitution’s application, the review by NYSDEC of the environmental impacts of extracting gas from the Marcellus shale via HVHF has generated information regarding future gas development that can be used to project development patterns. NYSDEC’s revised draft supplemental generic EIS for its gas development regulatory program contemplates green completions of new well development. If required, gathering lines would need to be constructed first so that subsequently drilled wells can connect immediately to a pipeline system instead of resorting to venting or flaring.³¹ EPA has likewise indicated that it soon will require green completions for gas development.³² Thus, drillers would have an incentive to construct wells as close to existing pipelines as possible. Even without a green completion requirement, significant cost savings are associated with siting well pads as close as possible to transmission pipeline receipt points. The Nature Conservancy (“TNC”) also concluded that distance to pipelines had predictive value when modeling potential well locations for an analysis of gas development impacts on high priority conservation areas across Pennsylvania.³³

³¹ NYSDEC, Revised Draft Supplemental Generic Environmental Impact Statement on the Oil, Gas and Solution Mining Regulatory Program: Well Permit Issuance for Horizontal Drilling and High-Volume Hydraulic Fracturing to Develop the Marcellus Shale and Other Low-Permeability Reservoirs 7-112–7-113 (Sept. 2011), *available at* http://www.dec.ny.gov/docs/materials_minerals_pdf/rdsgeisch70911.pdf.

³² U.S. EPA, Oil and Natural Gas Sector: New Source Performance Standards and National Emissions Standards for Hazardous Air Pollutants Reviews, 77 Fed. Reg. 49,490, 49,492 (Aug. 16, 2012).

³³ The Nature Conservancy, Natural Gas Pipelines: Excerpt from Report 2 of Pennsylvania Energy Impacts Assessment (Dec. 16, 2010), *available at* <http://www.nature.org/ourinitiatives/regions/northamerica/unitedstates/pennsylvania/ng-pipelines.pdf>.

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In addition, NYSDEC has projected the number of wells that are likely to be drilled in three of the counties crossed by the Project,³⁴ thereby facilitating an examination of the environmental impacts that will result from gas development that is induced in those areas. Indeed, TNC used NYSDEC's projections to conduct just this sort of an examination of impacts.³⁵ As part of its assessment, TNC conducted a spatial analysis of projected gas well pad development in Tioga County, New York,³⁶ and of the collective impact on forests that would be caused under various build-out scenarios.³⁷ Knowledge of the exact extent of induced development or the precise location of future wells is not necessary in order to conduct an analysis of indirect effects. *See Mid States*, 345 F.3d at 566. In order to satisfy its NEPA obligations, the Commission must issue a revised draft EIS that takes a hard look at the possibility that the Project indirectly will cause the development of gas wells in the counties crossed by the pipeline route and at the impacts to the environment that could result.

Similarly, the indirect effects of the construction and operation of the Leatherstocking distribution system must be considered in a revised draft EIS for the Project. The Draft EIS identifies providing gas supply to towns along the Pipeline route as one of the purposes of the Project, but fails to analyze the impacts of the construction and operation of a new gas distribution system and relegates its mention of the proposal to a mere two paragraphs. That one of the stated purposes of the Project is to provide gas to municipalities along the route, some of which have already granted Leatherstocking approval to deliver gas, makes clear that the Project is the cause of that distribution system. Moreover, the impacts of that system are reasonably foreseeable. Leatherstocking and Constitution have entered into a memorandum of understanding allowing for interconnection to the pipeline at several delivery points. Draft EIS at 1-2. Leatherstocking has stated that it "intends to construct facilities to serve the Village and Town of Sidney and is considering expansion to other potential service areas."³⁸ This is enough to warrant NEPA review. The distribution plan need not be fully developed in order for the Commission to take the requisite hard look at the impacts that will be caused by the construction of a distribution pipeline system, including additional land clearing and habitat disturbance, as well as emissions from the local distribution network. In addition, Constitution should identify for the Commission and the public all potential service areas along the Project route, and an environmental impact analysis should be completed for all of them.

In order to satisfy NEPA's requirement that agencies take a hard look at the indirect effects of a proposed action, the Commission must issue a revised draft EIS that analyzes the

³⁴ Ecology and Env't, Inc., Economic Assessment Report for the Supplemental Generic Environmental Impact Statement on New York State's Oil, Gas, and Solution Mining Regulatory Program (Aug. 2011), *available at* http://www.dec.ny.gov/docs/materials_minerals_pdf/rdsgeisecon0811.pdf.

³⁵ The Nature Conservancy, *An Assessment of the Potential Impacts of High Volume Hydraulic Fracturing (HVHF) on Forest Resources* (Dec. 19, 2011), *available at* <http://www.nature.org/ourinitiatives/regions/northamerica/unitedstates/newyork/ny-hydrofracking-impacts-20111220pdfnull.pdf> ("TNC Tioga Assessment").

³⁶ Broome County, through which the Project cuts, is adjacent to Tioga County.

³⁷ TNC Tioga Assessment.

³⁸ Answer of Leatherstocking Gas Company LLC in opposition to Motion for Extension of Time, FERC Docket No. CP13-499-000 (filed Mar. 31, 2014).

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cont'd | adverse environmental impacts that will result from upstream gas well development and downstream distribution of gas along the pipeline route.

CO41-24 | **F. Analysis of Cumulative Impacts Is Inadequate.**

While the Draft EIS includes a subsection purporting to discuss the cumulative impacts of the Project and recites the proper standard by which those impacts should be identified and considered, Draft EIS at 4-202, it fails to develop any meaningful analysis of cumulative impacts and, instead, offers a litany of conclusory assurances that no cumulative impacts will occur: “the cumulative effect of the projects on geological resources and soils would be temporary and minor,” *id.* at 4-220; “we anticipate that the proposed projects would only contribute to minor and temporary cumulative impacts on groundwater” *id.* at 4-221; “cumulative effect on wetland and waterbody resources would be temporary and minor,” *id.* at 4-223; “[t]he incremental and cumulative effect to vegetation would be minor,” *id.* at 4-223; “cumulative impacts are expected to be negligible for any individual wildlife species relative to the population in the region of influence,” *id.* at 4-224; “[t]he ensuing operations of the proposed pipeline would not result in any additional impacts unless maintenance activities occur in or near streams,” *id.* at 4-225.

This treatment of cumulative impacts falls short of what is required by NEPA—namely, a comprehensive analysis of the incremental impacts of the Project when considered in addition to other past, present, and reasonably foreseeable future actions. *See* 40 C.F.R. § 1508.7; *see also Oregon Natural Res. Council Fund v. Brong*, 492 F.3d 1120, 1132–33 (9th Cir. 2007) (“One of the specific requirements under NEPA is that an agency must consider the effects of the proposed action in the context of all relevant circumstances, such that where ‘several actions have a cumulative . . . environmental effect, this consequence must be considered . . .’”) (quoting *Neighbors of Cuddy Mountain v. U.S. Forest Serv.*, 137 F.3d 1372, 1378 (9th Cir. 1998)). Assessing the impacts of a proposed action within the context of existing and foreseeable effects in the same area yields “a realistic evaluation of the total impacts” and ensures that an EIS does not impermissibly “isolate a proposed project, viewing it in a vacuum.” *Grand Canyon Trust v. Fed. Aviation Admin.*, 290 F.3d 339, 342 (D.C. Cir. 2002).

A cumulative impact analysis cannot satisfy NEPA’s hard look standard unless the effects of the proposed action are viewed against the backdrop of past and present activities. The statute requires analysis of “the cumulative harm that results from [the proposed action’s] contribution to *existing adverse conditions or uses* in the area [E]ven a slight increase in adverse conditions that form an existing environmental milieu may sometimes threaten harm that is significant. One more factory . . . may represent the straw that breaks the back of the environmental camel.” *Grand Canyon Trust*, 290 F.3d at 343 (quoting *Hanly v. Kleindienst*, 471 F.2d 823, 831 (2d Cir. 1972)) (emphasis added). Moreover, NEPA requires some level of specificity in analyzing past projects. *See Brong*, 492 F.3d at 1133 n. 19 (“[An agency] cannot fulfill its responsibility to conduct a cumulative effects *analysis* by merely reciting what effects have occurred, no matter how many pages it fills by doing so [T]he time, type, place, and scale of past activities must be included.”).

Here, the Draft EIS purports to assess the impacts of other past, present, or reasonably foreseeable projects in the Project area, but fails to provide any detailed or quantified data to

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As discussed in section 4.13 of the EIS, where a potential for cumulative impacts was indicated, impacts were quantified to the extent practicable; however, in some cases the potential impacts can only be described qualitatively. This is particularly the case for projects that are in the planning stages; are contingent on economic conditions, availability of financing, and/or the issuance of permits; or for which there is a lack of comprehensive information available. Available information was used in the cumulative impacts analysis to the extent possible. Detailed information was not always available to quantify impacts.

See the response to comments LA1-4 and CO26-10 regarding natural gas extraction from the Marcellus Shale and cumulative impacts.

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CO41-24 cont'd	<p>support the analysis. Without an accurate account of either the baseline impacts of other actions or the incremental impact of the Project, the Commission cannot assess “the overall impact that can be expected if the individual impacts are allowed to accumulate”—the very essence of the cumulative impact analysis. <i>See Klamath-Siskiyou Wildlands Ctr. v. Bureau of Land Mgmt.</i>, 387 F.3d 989, 994–996 (9th Cir. 2004) (“Sometimes the total impact from a set of actions may be greater than the sum of the parts.”). Furthermore, the Draft EIS impermissibly relies entirely on presumed compliance with permitting requirements to justify its conclusion that no cumulative impacts will result from the Project. These inadequacies render the cumulative impacts analysis legally insufficient.</p> <p>For example, the Draft EIS identifies the development of gas wells and gathering systems in the Marcellus shale region as projects the effects of which warrant inclusion in an analysis of cumulative impacts, but it fails to include the required analysis with respect to the incremental impact of the Project’s effects <i>when added</i> to the to the impacts caused by those Marcellus shale development activities. The Commission justifies its failure to conduct the requisite cumulative impacts analysis on the false assumption that the proposed Projects would not have an adverse impact on the environment. This reasoning ignores the very purpose of a cumulative impacts analysis.</p> <p>As discussed in Section ILE, <i>supra</i>, the Draft EIS fails to make any attempt to evaluate the extent to which the construction and operation of the Pipeline Project will induce additional development of gas wells or will influence the location of gas well development. Regardless of whether the Pipeline Project induces gas drilling, however, future development is foreseeable and the types of impacts from such development are known and must be considered as part of a cumulative impacts analysis. Only once the baseline of impacts caused by the past, present, and future development of shale gas formations in the region is understood can any conclusions about the incremental impact of the Project be drawn.</p>
CO41-25	<p>Neither Constitution nor the Commission can dispute the fact that the Project, as proposed, would result in the fragmentation of forests and the loss of hundreds of acres of habitat. Even if the Commission concludes that the amount of habitat lost because of Project construction does not constitute a significant adverse impact, the additive impact of this habitat loss along with the destruction of habitat caused by past, present, or reasonably foreseeable gas development activities and other development activities in the region <i>could</i> constitute an adverse impact. This is precisely the analysis that NEPA requires agencies to undertake. Similarly, the Draft EIS fails to take the requisite hard look at the cumulative air quality impacts of the Project when considered in conjunction with other air pollution sources, including the Williams Central Compressor Station, and numerous compressors proposed for other projects.</p>
CO41-26	<p>In any event, the assumption that the Project will not cause significant adverse environmental impacts is unsupported by the facts presented in the Draft EIS. For example, the Commission has identified various materials regarding the potential impacts to water resources that Constitution has yet to provide.³⁹ Without a complete picture of the effects of the Project provided by information in the outstanding materials, the Commission is not in a position to</p>

³⁹ See Section IIA, *supra*.

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|---------|---|
| CO41-25 | Section 4.13.6.3 of the EIS has been revised regarding forested impacts. See the response to comment CO41-22 regarding cumulative impacts on air quality. |
| CO41-26 | See the response to comments FA1-1 and FA4-3. |

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont'd)

CO41-26
cont'd conclude that adverse impacts on water resources will not occur. The same is true for the Commission's analysis of Project impacts on forests, migratory birds, bats, other wildlife, visual resources, community character, and air quality, deficiencies in which foreclose any similar conclusion with respect to these resources.

CO41-27 The Draft EIS also improperly assumes that proposed construction practices and conditions on the permits issued for various aspects of the Projects will avoid, minimize, or sufficiently mitigate any potential impacts. This conclusion finds no support in the facts. Indeed, other FERC-authorized pipeline projects for which state permits were granted have resulted in adverse impacts to water resources, as evidenced by the numerous notices of violation issued.⁴⁰ In addition, Cabot Oil & Gas Corp., the supplier of the majority of the gas proposed for transport along the pipeline and an affiliate of one of the co-owners of Constitution, has a record of permit violations in Pennsylvania; since the beginning of 2010, Cabot has been cited with 393 violations at unconventional well sites (accounting for over 10 percent of total violations in the state).⁴¹ Williams Fields Services Company, the operator of one of the two compressor stations that will power the flow of gas through the pipeline and an affiliate of one of the co-owners of Constitution, also has a history of violations at its facilities, including those associated with a fire at the Williams Central Compressor Station last May⁴² and resulting in \$388,694 in fines for 2013 alone.⁴³ Rather than blindly accepting Constitution's promises of regulatory compliance, the Commission must take into account the high likelihood that permit conditions will be violated and that BMPs will not be implemented effectively.

CO41-28 Finally, the Draft EIS improperly concludes that the Project will not have significant cumulative impacts because its construction schedule will not overlap with that of any other projects in the area. Draft EIS at 4-216–4-220. This conclusion ignores the fact that the Project will continue to cause adverse environmental effects after construction activities have been completed and highlights the Commission's failure, as discussed above, to give due consideration to long-term impacts that will occur outside of the permanent right-of-way. In order for an adequate cumulative impacts analysis to be conducted the full scope of the Project's effects must first be understood.

⁴⁰ See, e.g., Tennessee Gas Pipeline Co., LLC, Monthly Status Report, Northeast Upgrade Project 3, FERC Docket No. CP11-161-000 (filed Apr. 2, 2014) (listing problems with BMPs and instances of non-compliance with permit conditions); Beth Brelje, DEP, *Tennessee Gas continue talks about fines*, Pocono Record, Nov. 27, 2012, <http://www.poconorecord.com/apps/pbcs.dll/article?AID=/2012/11/27/NEWS/211270320/-1/rss01> (reporting hundreds of violations).

⁴¹ PADEP, Oil & Gas Reports, http://www.portal.state.pa.us/portal/server.pt/community/oil_and_gas_reports/20297. Total violations were calculated by clicking "Oil and Gas Compliance Report," selecting the inspection period between 1/1/2010 and 3/1/2014, setting "OPERATOR" to "CABOT OIL & GAS CORP (43513)," and setting "UNCONVENTIONAL ONLY (PF INPSECTIONS)" to "Yes."

⁴² Joseph Kohut, *Fire, possible explosion at Susquehanna gas compressor station thought to be accidental*, THE TIMES TRIBUNE, May 16, 2013, <http://thetimes-tribune.com/news/fire-possible-explosion-at-susquehanna-gas-compressor-station-thought-to-be-accidental-1.1489789>.

⁴³ Laura Legere, *DEP fined oil and gas companies \$2.5 million last year*, StateImpact Pennsylvania, Feb. 27, 2014, <http://stateimpact.npr.org/pennsylvania/2014/02/27/dep-fined-oil-and-gas-companies-2-5-million-last-year/>. See also NY Friends of Clean Air and Water, *Williams Compressor Station, Windsor NY is (again) on Fire*, <http://nyfriendsofcleanairandwater.blogspot.com/2014/01/williams-compressor-station-windsor-ny.html> (listing incident at Williams facilities).

CO41-27

See the response to comment FA4-12 regarding the FERC's third-party compliance monitoring program. While non-compliance with a FERC permit condition is possible, daily inspections by EIs and the FERC's compliance monitors are conducted to ensure timely discovery and appropriate remediation. Enforcement of permit requirements for non-FERC-jurisdictional projects would be the responsibility of the agency issuing the permit.

CO41-28

The commentor's statements regarding the cumulative impacts section are noted.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

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CO41-28
cont'd

U.S. EPA, U.S. FWS, U.S. Army Corps of Engineers, NYSDEC, and intervenors have all called for the comprehensive analysis of the Project’s cumulative impacts that NEPA requires.⁴⁴ The Draft EIS does not include the comprehensive analysis required, and intervenors, therefore, request that the commission prepare a revised draft EIS that does.

CO41-29

G. Analysis of Impacts of the Williams Central Compressor Station Is Inadequate.

When conducting a review of the environmental impacts of a proposed action under NEPA, the Commission has recognized that it “must also give some environmental consideration to nonjurisdictional facilities built in conjunction with jurisdictional facilities if the entire project would constitute a major federal action.” *Algonquin Gas Transmission Co.*, 59 FERC ¶ 61,255, 61,933 (June 2, 1992). Four factors are to be considered when determining whether to include nonjurisdictional facilities as part of the environmental review of a project—namely, “(A) Whether or not the regulated activity comprises ‘merely a link’ in a corridor type project (e.g., a transportation or utility transmission project). (B) Whether there are aspects of the nonjurisdictional facility in the immediate vicinity of the regulated activity which uniquely determine the location and configuration of the regulated activity. (C) The extent to which the entire project will be within the Commission’s jurisdiction. (D) The extent of cumulative Federal control and responsibility.” 18 C.F.R. § 380.12(c)(2)(ii).

In its Draft EIS, the Commission again recognizes the requirement to consider certain non-jurisdictional facilities, stating “FERC is required to consider, as part of its decision to authorize interstate natural gas facilities, all factors bearing on the public convenience and necessity. Occasionally proposed projects have associated facilities that do not come under the jurisdiction of the Commission.” Draft EIS at 1-11. The Draft EIS goes on to list two metering and regulating (“M&R”) stations (the White Road M&R Station and the Sutton Road M&R Station) in Susquehanna County as associated with the Project and, thus, warranting review under NEPA, because they will make possible the input of gas into the pipeline. By this reasoning, the Williams Central Compressor Station, which will provide the compression necessary to transport the input gas through the pipeline and which is also located in Susquehanna County, adjacent to the White Road M&R Station, also warrants review under NEPA.

Without the Williams Central Compressor Station (owned and operated by Williams Field Services Co.)—which was expanded just months after Constitution (a joint venture owned in part by a Williams Field Services Co. affiliate) submitted its application for a Certificate for the Pipeline Project—the White Road M&R Station (owned and operated by Williams Field

⁴⁴ U.S. EPA, Comments re the Notice to Prepare an Environmental Impact Statement for the Constitution Pipeline Project, FERC Docket No. PF12-9 (filed Oct. 16, 2012); U.S. FWS, Comments on Notice of Intent to Prepare Environmental Statement for the Planned Constitution Pipeline Project 2–3, FERC Docket No. PF12-9-00 (filed Oct. 5, 2012); U.S. Army Corps of Engineers, Comments Regarding the Preparation of an Environmental Impact Statement for the Proposed Constitution Pipeline Project, FERC Docket No. PF12-9 (filed Oct. 9, 2012); NYSDEC, Preliminary Comments on Notice of Application for Constitution Pipeline Company, LLC (Project), FERC Docket No. CP13-499-000 (filed July 17, 2013).

CO41-29

As discussed in section 4.13 of the EIS, the existing Williams Central Compressor Station was placed into service in 2013 and is currently being modified for use by Williams’s Springville Pipeline. This facility was permitted by the PADEP and construction had begun before Constitution’s project was filed with the Commission. Section 4.13.6.10 has been revised to include additional information regarding permitted air quality emissions for the Williams Central Compressor Station.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont'd)

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CO41-29 cont'd	<p>Services Co.) would serve no purpose and Cabot Oil & Gas Corp. (also affiliated with the Constitution joint venture) would not be able to transport its gas to market via the Pipeline.</p> <p>The Draft EIS lists the Williams Central Compressor Station as a “non-jurisdictional <i>Project-related facility</i>,” Draft EIS at 4-211 (emphasis added), but includes no analysis of the environmental impacts of the facility or any justification for its failure to include that analysis. Williams’ compressor station is not, as Constitution has argued, “merely a link” in a larger transmission project; without it, operation of the part-Williams-owned Constitution Pipeline would not be possible. Despite Constitution’s attempts to downplay the connection between the Pipeline and the Williams’ compressor station, the company has acknowledged that the location of Pipeline Project facilities were chosen based on the location of the compressor station.⁴⁵ The impacts associated with the operation of this facility—in particular, the air quality impacts discussed above—must be evaluated in a revised draft EIS. Even if the Commission rejects the conclusion that the impacts of this facility must be considered as part of the Project’s impacts, it must include those impacts as part of its analysis of cumulative impacts. It has not done so.</p>
CO41-30	<p>II. The Draft EIS Fails to Properly Consider Purpose and Need and Reasonable Alternatives.</p> <p>The alternatives analysis presented in the Draft EIS does not satisfy the requirements of NEPA. An agency preparing an EIS must “[r]igorously explore and objectively evaluate all reasonable alternatives” to a proposed action. 40 C.F.R. § 1502.14(a). Consideration of alternatives is “the heart of the environmental impact statement,” because it compels agencies to “present the environmental impacts of the proposal and the alternatives in comparative form, thus sharply defining the issues and providing a clear basis for choice among options by the decisionmaker and the public.” <i>Id.</i> Fundamentally, an agency must “to the fullest extent possible . . . consider alternatives to its action which would reduce environmental damage.” <i>Calvert Cliffs’ Coordinating Comm., Inc. v. U.S. Atomic Energy Comm’n</i>, 449 F.2d 1109, 1128 (D.C. Cir. 1971) (emphasis in original). Absent this comparative analysis, decisionmakers and the public can neither assess environmental trade-offs nor avoid environmental harms. <i>See id.</i> at 1114 (NEPA’s alternatives requirement “seeks to ensure that each agency decision maker has before him and takes into proper account all possible approaches to a particular project (including total abandonment of the project) which would alter the environmental impact and the cost-benefit balance” and “allows those removed from the initial process to evaluate and balance the factors on their own”).</p> <p>The alternatives must include “reasonable alternatives not within the jurisdiction of the lead agency,” as well as “appropriate mitigation measures not already included in the proposed action or alternatives.” 40 C.F.R. § 1502.14. Because alternatives are so central to decisionmaking and mitigation, “the existence of a viable but unexamined alternative renders an environmental impact statement inadequate.” <i>Oregon Natural Desert Ass’n v. Bureau of Land Mgmt.</i>, 625 F.3d 1092, 1100 (9th Cir. 2010) (internal alterations and citations omitted).</p> <p>⁴⁵ Constitution Pipeline Co., Resource Report No. 1: General Project Description, 1-64, FERC Docket No. CP13-499-000 (filed June 2013).</p>

CO41-30

The commentator’s statement regarding the no-action alternative section is noted. As stated in section 3.1 of the EIS the no-action alternative would avoid the environmental impacts of the proposed projects, but it would result in the need for alternate means to satisfy the demand for natural gas, or other source of energy. Even if the project were to be cancelled, the demand for energy would not go away. The no-action alternative would likely lead end users to seek energy from other sources including other fossil fuels and renewable energy sources. Section 3.1 evaluated each type of renewable energy and fossil fuels relative to the proposed projects.

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CO41 – Earthjustice (cont'd)

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CO41-30 conf'd	An alternatives analysis must include the agency's evaluation of a "no action" alternative. 40 C.F.R. § 1502.14(d). This "provides the standard by which the reader may compare the other alternatives" beneficial and adverse impacts related to the applicant doing nothing." <i>Kilroy v. Ruckelshaus</i> , 738 F.2d 1448, 1453 (9th Cir. 1984). To fulfill this requirement, the Commission must "compare the potential impacts of the proposed major federal action to the known impacts of maintaining the status quo." <i>Custer Cnty. Action Ass'n v. Garvey</i> , 256 F.3d 1024, 1040 (10th Cir. 2001). The Draft EIS contains no such comparison. Instead, the no action alternative section simply describes a number of options for meeting energy demand, but rejects each as impractical. Draft EIS at 3-2-3-12. In order to satisfy NEPA's requirements, the no action alternative discussion must present an evaluation of maintaining the status quo against which other proposed alternatives can be compared. ⁴⁶
CO41-31	With respect to co-locating the Pipeline Project with existing pipeline systems or other rights-of-way, the Commission rejected a number of viable options absent a hard look at all of the impacts associated with those alternatives. For example, certain co-location options were rejected because they would require slightly longer total project routes. Draft EIS at 3-19-3-24. This reasoning rings hollow, given the ease with which the Commission discounts the impacts to forests and water resources associated with the construction and maintenance of the right-of-way for the proposed Project. Indeed, the Commission rightly rejected Constitution's "Alternative K," even though it would have been <i>shorter</i> than the preferred route, because it would have crossed the New York City Water Supply Watershed. <i>Id.</i> at 2-25-2-30. Intervenor agree that Alternative K is not a viable alternative and support an analysis that prioritizes the need to protect important natural resources. A similar analysis should apply to alternatives for co-location along existing pipelines, even if such alternatives would entail slightly longer routes.
CO41-32	The alternatives analysis also fails to take a hard look at the possibility of co-locating all or substantial portions of the Pipeline Project with Interstate (I)-88. This alternative—"Alternative M"—would result in far fewer impacts to interior forest habitat than the preferred route. Indeed, the Commission's comparison of Alternative M with the proposed route illustrates its underestimation of impacts to interior forest habitat. Because interior forests are defined as "forested areas greater than 300 feet from the influence of forest edges or open habitat," Draft EIS at 4-70, any portion of the Alternative M route that is closer than 300 feet to highway I-88, by definition, will not impact interior forests. More analysis of this viable alternative is warranted. ⁴⁷
CO41-33	In addition to major system or route alternatives, the Draft EIS fails to take a hard look at less dramatic Project alternatives that could avoid or minimize the expected environmental impacts of the Projects. For example, the Draft EIS provides no assessment of the benefits or feasibility of wetland creation, 20-1 tree replacement, long-term monitoring of stormwater impacts or invasive species proliferation, alternative construction techniques, equipment options, or fuel sources, or the purchase of carbon offsets to mitigate the projects' climate impacts.

⁴⁶ See also Otsego 2000, Comments on Draft EIS for Constitution Pipeline, FERC Docket No. CP13-499-000 (filed Apr. 4, 2014) (incorporated fully by reference herein).

⁴⁷ See U.S. Army Corps of Eng'rs, Comments on Draft EIS for Constitution Pipeline Project, FERC Docket No. CP13-499-000 (filed Apr. 7, 2014) (noting Army Corps' concerns regarding analysis of Alternative M).

CO41-31

The comment is noted. We assume that the commentor is referring to the EmKey-Dominion-TGP 200 collocated alternatives. This alternative would be 23 miles longer than the proposed pipeline. As stated in section 3.3 of the EIS, this alternative was also rejected due to more and larger workspaces, greater land disturbance, impacts on more landowners, greater total environmental impacts relative to the proposed pipeline (including a crossing of the Susquehanna River), and reliance upon collocation with a proposed pipeline route for which ultimate approval and construction is uncertain. The other collocated alternatives would be two or three times longer than the proposed pipeline and can not be categorized as "slightly longer" routes.

CO41-32

See the response to comment FA4-16.

CO41-33

Compensatory wetland mitigation is discussed in section 4.4.5 of the EIS. Constitution would at a minimum be required to monitor revegetation efforts after the first and second growing seasons and to continue efforts until the density and cover by non-nuisance species are similar to adjacent lands not disturbed by construction. All sediment and erosion control devices would be routinely inspected by the FERC monitors during construction. See the response to comment FA6-10 regarding tree planting and monitoring for invasive species. As stated in section 2.5.5 of the EIS, Constitution would perform monitoring for invasive plant species on at least an annual basis for 3 years following construction. Specialized construction techniques and options are discussed in section 2.3 of the EIS, many of which are part of Constitution's proposal. Climate change is discussed in section 4.13.6.10 of the EIS.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

CO41-34 III. The Project Will Not Serve the Public Interest or Public Convenience and Necessity.

Section 7 of the NGA, 15 U.S.C. §717f, and FERC’s Statement of Policy for Certification of New Interstate Natural Gas Pipeline Facilities, 88 FERC ¶ 61,227 (1999), clarified, 90 FERC ¶ 61,128 (2000), further clarified, 92 FERC ¶ 61,094 (2000) (“Certificate Policy Statement”), require the Commission to determine whether the Project facilities are “in the public interest” and whether the proposed pipeline is “required by the public convenience and necessity.” Specifically, the Certificate Policy requires the Commission to balance the alleged need for a project against the adverse impacts on affected landowners and the surrounding communities. 88 FERC ¶ 61,747. Stated simply, the Commission cannot approve a project unless it concludes that the project’s benefits outweigh its adverse impacts.

As explained above, the Draft EIS fails to demonstrate that impacts on landowners and the surrounding community have been mitigated or are outweighed by any alleged public benefits of the Projects. Absent the comprehensive assessment of adverse impacts to landowners and surrounding communities that NEPA requires, the Commission is not in a position to draw a conclusion as to whether the Projects’ potential public benefits outweigh the potential adverse effects. Moreover, and as discussed in detail in the Report on the Need for the Proposed Constitution Pipeline, incorporated fully by reference herein,⁴⁸ the Commission’s assumptions that the Projects will fulfill a market need in New York City and New England are misplaced.

IV. Conclusion

For the reasons set forth above, the Draft EIS contains a significant number of crucial deficiencies that require that the Commission conduct additional analysis of the Project and its environmental impact and issue a revised draft EIS for public review and comment prior to proceeding with a decision on Constitution’s and Iroquois’ applications for Certificates of Public Convenience and Necessity.

Respectfully submitted,



Bridget M. Lee

*On behalf of Catskill Mountainkeeper,
Clean Air Council, Delaware-Otsego
Audubon Society, Delaware Riverkeeper Network,
Riverkeeper, Inc., and Sierra Club*

⁴⁸ Anne Marie Garti, Report on the Need for the Proposed Constitution Pipeline, FERC Docket No. CP13-499-000 (filed Apr. 7, 2014).

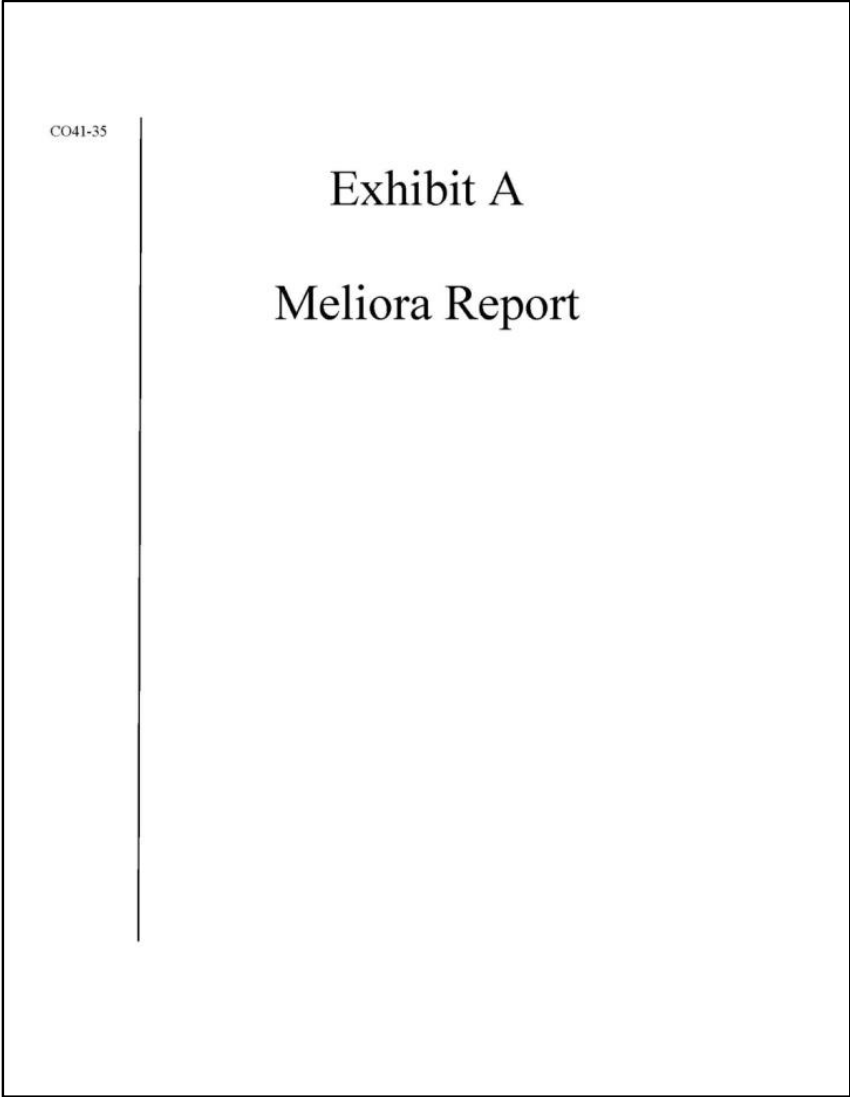
CO41-34 See the response to comment LA7-5.

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CO41 – Earthjustice (cont’d)

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CO41-35 Each of the points raised by the commentor in the Executive Summary will be discussed in detail below within the responses to CO41-36 through CO41-80.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont'd)

CO41-35
cont'd

Professional Review & Comment

on

Draft Environmental Impact Statement for
Constitution Pipeline Project (February 2014),
FERC Docket No. CP13-499-000

April 7, 2014

Prepared for:

Earthjustice

Prepared by:

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CO41 – Earthjustice (cont’d)

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CO41-35
cont'd

EXECUTIVE SUMMARY

Due to previous experience reviewing gas pipeline projects in the Mid-Atlantic, Meliora Environmental Design, LLC (Meliora Design) was asked to provide professional review and comment on the Draft Environmental Impact Statement for Constitution Pipeline Project (February 2014). In general, the comments address issues directly related to surface soils, steep slopes, stream and wetland crossings, and to a lesser extent, karst and shallow bedrock, as they relate to and impact surface water quality and quantity.

While the Draft Environmental Impact Statement and supporting documentation contain information related to soils, steep slopes, stream and wetland crossings, and other sensitive natural features whose disturbance may adversely affect water quality, our primary findings are that:

1. This information is often limited or insufficient. For example, limited information and no site-specific testing is required for soils conditions outside of agricultural or residential areas. As a result, the information on existing soils conditions, and the measures necessary to evaluate potential impacts, prevent those adverse impacts, or successfully achieve soil restoration, is lacking from the Draft Environmental Impact Statement ("Draft EIS"). Without such information the Draft EIS is incomplete and inadequate.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-465

CO41-35
cont'd

2. Most importantly, there is no consideration or process to identify and evaluate specific locations that include one or more of these or other sensitive natural features. For example, an area of highly erodible soils on steep slopes adjacent to a high quality stream is likely to experience greater impacts due to site disturbance, and to have a much higher likelihood of subsequent conditions after disturbance (i.e., erosion, lack of vegetation establishment, etc.) that could adversely impact water quality. However, there is no process to identify areas of multiple sensitive features, or to consider the potential impacts that could be caused when multiple sensitive features are disrupted at a single location. As a result, the likelihood of potential adverse water quality impacts cannot be accurately assessed. Without a process to identify areas of multiple sensitive features and evaluate potential impacts, the Draft EIS is incomplete and inadequate.

3. There is no consideration of the cumulative impacts and effects within a given watershed or sub-watershed, and whether these impacts are few and limited, or extensive and likely to impact water quality. There also is no consideration as to the nature of the waterbody and whether these impacts may be large and significant. A small headwater tributary, with a limited drainage area and baseflow, may experience greater impacts than a larger waterbody. Multiple stream crossings are likely to have a higher impact on water quality than a single stream crossing. However, the documents due not provide a process for identifying these conditions. As a result, the cumulative impacts on water quality cannot be assessed, and the Draft EIS is incomplete and inadequate.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

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CO41-35 cont'd	<p>Given the availability of information in a geographic information system database (GIS) format, there is no basis for failing to undertake this comprehensive analysis related to both multiple sensitive site conditions and cumulative impacts. This analysis is a standard practice in the use of GIS data to develop sensitivity indexes and should be a component of the Draft EIS. The documents must include both comprehensive data, and an analysis of the data to identify and evaluate potential adverse water quality impacts due to the presence of multiple sensitive environmental conditions and/or cumulative impacts. A GIS-based approach of data analysis could be used to identify sensitive features that have not been deemed relevant enough to protect individually, but are significant when aggregated.</p> <p>4. The construction of the pipeline will involve large amounts of land disturbance that will adversely impact the surface soils' ability to regrow vegetation or naturally infiltrate rainfall. Once rainfall is not infiltrated and vegetation cover is decreased or inhibited, runoff volume and rate will increase. With these increases, accelerated erosion and sediment transport can occur more frequently and in larger amounts, causing irreparable damage to local wetlands, streams, and other waterbodies. Many land use types, existing land uses, soil types, or topography are more sensitive to land disturbance and should be thoroughly evaluated for unnecessary and excessive impacts during construction. Appropriate construction practices to avoid or reduce disturbance, or restoration measures to mitigate impacts to sensitive land uses, cannot be implemented unless these areas are identified and</p>
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COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

CO41-35
cont'd

evaluated. The Draft EIS lacks adequate information on soils conditions, but also lacks consideration of the impacts of soil disturbance, and recommendations to prevent or mitigate these impacts, including recommendations to limit disturbance in sensitive areas. As a result, the Draft EIS is inadequate.

5. The fact that stream crossings only consider borings as a crossing option when a modest-sized stream is located next to a roadway implies that avoidance of roadway disturbance has a higher priority than avoidance of stream channel disturbance. Similarly, the lack of soil testing requirements in public lands implies that these lands are less important than residential or agricultural lands.

As a result of these deficiencies, it is our opinion that significant adverse impacts are likely to occur to water quality within many of the streams and wetlands impacted by this project. Without complete data and comprehensive evaluation of the data, the areas of significant impact cannot be adequately identified, and measures to prevent or mitigate adverse impacts cannot be implemented.

Specific deficiencies within the Draft EIS are documented below.

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CO41 – Earthjustice (cont’d)

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CO41-35
conf'd

Documents reviewed include:

- a. FERC’s Draft Environmental Impact Statement for the Constitution Pipeline and Wright Interconnect Projects, February 2014 (Executive Summary; Sections 1–5; Appendices A–R)
- 2. Constitution’s Resource Report 1: General Project Description, November 2013 (Environmental Report, Vol. I)
- 3. Constitution’s Resource Report 2: Water Use and Quality, November 2013 (Environmental Report, Vol. I)
- 4. Constitution’s Resource Report 7: Soils, November 2013 (Environmental Report, Vol. I)
- 5. Constitution’s Soil Erosion & Sediment Control Narrative & Environmental Construction Plan, Construction Activities in Pennsylvania, November 2013 (Environmental Report, Vol. II, Appx. I)
- 6. Constitution’s Environmental Construction Plan, Construction Activities in New York, November 2013 (Environmental Report, Vol. II, Appx. J)
- 7. Constitution’s Wetland Delineation Report, November 2013 (Environmental Report, Vol. II, Appx. L)
- 8. Constitution’s Site Specific Major Waterbody Crossing Plan, November 2013 (Environmental Report, Vol. II, Appx. M)
- 9. Constitution’s Trenchless Feasibility Study, November 2013 (Environmental Report, Vol. II, Appx. N)

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

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CO41-36

DISCUSSION

1. Outstanding Information Regarding Project Impacts

Constitution desires construction to begin 2nd and 3rd quarter of 2014. FERC has requested more documentation on various components of the project that should be publicly reviewed prior to approval. A revised draft EIS that incorporates the outstanding documentation should be published for public comment before any Project approvals are granted. Additional information requested by FERC include:

- a. Formal slope stability analysis at MP 30.3.
- b. Geotechnical feasibility study for all trenchless crossing locations.
- c. Identification of all water wells within 150 ft. of the proposed pipeline.
- d. Description of impacts of workspace on waterbodies affected by construction on a waterbody specific basis to describe impacts, impact avoidance, impact minimization, and impact mitigation.
- e. Site-specific plans for impacts to wetlands by permanent access roads.
- f. Upland Forest Mitigation Plan.
- g. Site-specific blasting plans for in-water blasting.
- h. Timing restrictions for water withdrawals.

Finalized documentation should be provided by Constitution to FERC prior to Draft EIS finalization. Many instances of FERC only having partial studies or evaluations were noted in the documents. FERC should be waiting to do their evaluation until all information is provided.

CO41-36

See the response to comment FA1-1.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-470

CO41-37

2. Surface Impacts to Soils

FERC concludes that surface impacts to soils are only temporary and relies on best management practices of other regulatory agencies to provide additional guidelines to help prevent irreversible damage to surface soils during construction. However, these guidelines are limited in nature and do not prevent soil compaction. The guidelines do not require restoration practices that sufficiently mitigate soil compaction due to construction impacts. With the exception of agricultural and residential lands, FERC does not require testing to identify soils highly susceptible to damage from construction.

Previous field investigations performed by Meliora Design on behalf of Delaware Riverkeeper Network in temporary right-of-way (ROW) locations along the Tennessee Gas Pipeline’s 300 Line Upgrade Project in Milford, Pennsylvania, showed increased soil compaction as reflected in increased soil bulk density measurements when the temporary ROW locations were compared to undisturbed natural areas adjacent to the pipeline ROW. Severe compaction was noted within the former temporary ROW. Based on literature values, measured bulk densities were high enough to inhibit plant growth and infiltration. By limiting plant growth and infiltration, runoff volume and rate will be increased. The conditions were considered stabilized and restored even though they had less than 70% vegetative cover (potentially inhibited by measured compaction). Absent more stringent requirements, construction activities for the Constitution Pipeline Project likely will

CO41-37

See the response to comments CO1-4 and CO41-18. As stated in section 2.5.5 of the EIS, restoration of upland areas would be considered successful if the right-of-way vegetation restoration is successful based on visual assessment of density and cover, surface conditions are similar to adjacent undisturbed lands, construction debris is removed, and proper drainage has been restored.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

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CO41-37
cont'd

result in severely compact soils that are incapable for supporting plant growth or for allowing natural infiltration of rainfall.

CO41-38

- a. Compaction from temporary work space will be difficult to restore by regrading to pre-existing contours, retilling at the surface, and reseeding the area. Heavy equipment used in the construction of the pipeline will inherently compact work areas to depths deeper than conventional surface tilling will reach. Lasting impacts identified by FERC include increased runoff to streams and wetlands due to a reduction in infiltration capacity and difficulty in reestablishing vegetation. Infiltration capacity becomes limited when soils lose their porosity and soil structure, resulting in increased runoff volumes to streams. Excessive runoff changes stream geomorphology due to an increase in both volume and velocity. Streambanks and riparian areas are impacted by changes to the stream channel due to the increases in peak flow volume and rate. Streams with more flow also have higher energy. More energy means more in-stream erosion and sediment transport. Compaction creates conditions where bulk densities of soils are so high that the soils inhibit the germination of plants and plant root growth. The establishment of vegetative cover within the pipeline ROW will be more difficult once surface soils are compacted. If vegetation regrowth is limited within both the temporary and permanent ROW, the likelihood of accelerated erosion will be increased. Avoidance of compaction can be achieved by limiting ROW widths to prevent compaction before it takes place. To determine if compaction is

CO41-38

See the response to comments CO1-4 and CO41-37. As stated in section 4.2.4 of the EIS, temporary erosion control devices would be installed prior to construction. These devices would be inspected regularly to determine whether repair or replacement is necessary and would only be removed following successful revegetation of an affected area.

Constitution would follow many procedures in areas outside of agricultural and residential areas such as adhering to a maximum allowable rutting depth of 4 inches in saturated agricultural areas (section 4.2.4), reducing the proposed construction right-of-way width from 110 feet, as originally proposed, to 100 feet within interior forest areas where practicable (section 4.5.3), limiting the construction right-of-way width to 75 feet in wetlands (except in areas where site-specific conditions require additional space), and using low ground weight equipment or operate equipment on timber mats in saturated wetlands to prevent rutting (section 4.4.3). We require decompaction measures within residential and agricultural areas as a higher priority relative to other areas (such as forested uplands) due to concerns such as residential lawn condition and crop yields.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-472

CO41-38 cont'd	<p>present, soil testing needs to be conducted. By limiting the testing of bulk densities outside of agricultural and residential areas, there is no mechanism for identifying soils that have been compacted along the majority of the project length. Procedures that limit compaction deep into the soils such as limiting rutting depths, limiting ROW widths, using timber mats in wet areas with a likelihood of compaction, and restoring soil structure following impacts, should be required more widely than only in agricultural and residential areas.</p>
CO41-39	<p>b. Because compaction along the pipeline is a potential impact, FERC calls for penetrometer testing of soils within agricultural and residential areas to make sure soils are decompacted following construction. When testing indicates compaction in these areas, Constitution will be asked to implement decompaction procedures according to the <i>Soil Protection and Subsoil Decompaction Plan</i>. This plan is not implemented in other land uses and therefore no compaction will be mitigated following construction in wetlands, interior forests, or other sensitive areas. Natural land uses such as interior forests and wetlands rely on vegetative cover to prevent the movement of soils during rain events by intercepting rainfall, stabilizing soils with their roots, and protecting surface soils with leaf litter and detritus. They also require soil with bulk densities low enough to allow for germination and root penetration, infiltration of rainfall, and the movement of nutrients from the surface down into the root zone. The Draft EIS does not</p>

CO41-39 See the responses to comments CO1-4, CO41-10 and CO41-38.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-473

CO41-39 cont'd	<p>explain why agricultural and residential should receive greater protections than natural lands. All land uses will experience more sediment laden runoff from their surfaces, limited regrowth of plants and vegetation, and exposed soil surfaces after compaction. The same considerations to prevent or restore compacted soils should be implemented for both actively used lands as passively used lands. Accelerated erosion is probably the largest concern resulting from soil compaction. When runoff cannot infiltrate, isn't slowed at the surface by vegetation, and has a direct connection to exposed soils, sediments are more likely to be transported to downhill streams and wetlands.</p>
CO41-40	<p>c. FERC recommends avoidance of rutting below 4" in agricultural areas to avoid compaction. These recommendations should be implemented throughout the project area.</p>
CO41-41	<p>d. The Draft EIS only identifies soils in agricultural and residential areas that contain specific fine textures and high water tables as being highly susceptible to compaction. Without identifying similar areas in interior forests, wetlands, or close to streams, no determination of potential impacts can be made due to a lack of information being provided. Extensive areas being crossed by the pipeline may fall into the category of susceptible to compaction.</p>

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CO41-40	The commentor’s statement regarding rutting is noted.
CO41-41	Information regarding soil limitations, including soils with high erosion and compaction potential along the proposed pipeline, access roads, and additional temporary workspaces was provided in section 4.2.2 of the EIS.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

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CO41-42	<p>e. The ECPs call for wetlands to be decompacted as necessary if mats are not utilized. No quantification is given and no testing is called for to determine allowable compaction limits or thresholds to decompact wetlands. Wet soils are especially susceptible to impacts from construction activity.</p> <p>f. The Draft EIS discounts the impacts to resources located outside of the permanent ROW, asserting that “most impacts on soil will be temporary and short-term.” This conclusion is not supported by the information contained in the Draft EIS. Once a soil’s structure is disturbed with heavy equipment, compaction, and removal of surface vegetation, it is very difficult to regain structure that allows for infiltration of surface water or the regrowth of healthy vegetation following construction. The only way to avoid permanent compaction of soils is to prevent the compaction from taking place in the first place (by limiting ROW widths) and to employ soil disturbance techniques that preserve soil structure.</p> <p>g. FERC notes that pipeline activities such as “clearing, grading, trenching, and backfilling, could adversely affect soil resources by causing accelerated erosion, compaction, and introduction of rock or fill material to the surface.” FERC relies upon environmental construction plans that focus on temporary erosion and sedimentation controls to address soil impacts. While temporary erosion and sedimentation measures may help to limit the transport of eroded soils, they cannot fully eliminate the acceleration of</p>
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CO41-42

See the response to comment CO41-38. Constitution’s EIs would monitor the condition and effectiveness of installed erosion control devices. In addition, our third-party compliance monitors would also inspect installed erosion control devices, hydrology, and revegetation. Restoration would not be considered complete until hydrology and vegetation are restored.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont'd)

S-475

CO41-42 cont'd	<p>erosion or soil compaction caused by construction. Once sediment reaches a stream or wetland, changes to the habitat of plants, fish, and insects can take place. Typically, healthy streams have gravel bottoms and cobble bars free of mud and sediment. This allows for spawning areas for fish and habitat for insects and plants. Sediment from accelerated erosion smothers fish eggs and covers spawning areas with fine sediments, thus inhibiting fish reproduction. Increased turbidity in streams and wetlands prevents light penetration into the water column and increases water temperatures. Decreased light penetration can retard plant growth in streams, wetlands, and lakes. Sediment in the water column also physically impacts fish by interfering with their ability to remove oxygen from the water. Downstream lakes and reservoirs can also begin to fill in due to sediment accumulation.</p>
CO41-43	<p>3. Impacts to Steep Slopes</p> <p>Steep slopes are found consistently throughout the length of the pipeline. When combined with erodible soils, the ability for construction crews to manage runoff and sediment discharge from the construction site becomes more difficult. Many of these areas are directly adjacent to wetland or stream crossings where additional disturbance will take place. More study needs to be done to identify areas of cumulative impact due to slope, soils, proposed disturbance, and proximity to water resources such as wetlands or high value streams. Steep slopes alone do not necessarily cause accelerated erosion. The exposure of soils to direct rainfall from vegetation clearing, the disturbance of the soil structure from excavation, and the</p>

CO41-43

See the responses to comments CO41-10 and CO41-38. In addition, as stated in section 2.3.1 of the EIS, all work areas would be final graded and restored to pre-construction contours and natural drainage patterns as closely as possible. The right-of-way must be seeded within six working days following final grading, (weather and soil conditions permitting) to expedite the process of revegetation and limit likelihood of sedimentation and erosion. Temporary erosion controls would be left in place until vegetation can provide the same degree of erosion control.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont'd)

CO41-43
cont'd

reduction of infiltration following compaction all increase runoff volumes. Increased runoff volumes and rates increase sediment transport into streams and wetlands. When higher runoff volumes travel down steep slopes, erosive flow conditions increase, thus causing accelerated erosion. Temporary erosion controls can help to slow down runoff and limit downstream sedimentation. But once temporary erosion control is removed, it is up to the stabilizing vegetation and any permanent erosion control to reduce runoff velocities. Because construction practices can compact soils and inhibit vegetation regrowth, areas of steep slopes can become a large source of sediment-laden runoff to nearby streams and wetlands.

CO41-44

- a. Numerous areas were identified as potential landslide areas. The likelihood for these soils to become unstable during or after construction is high. Multiple features also contain seepage or drainage features which can provide for greater accelerated erosion potential or exacerbate the likelihood of a landslide. Pipeline activity such as trenching along slopes and equipment on unstable surfaces will potentially increase the risk of landslides. Slope failure in combination to poorly managed stormwater runoff can increase the likelihood of sedimentation of nearby streams and wetlands. The Draft EIS recommends measures to minimize landslide potential including compaction of fill, installation of trench breakers, and minimization of stockpiling on slopes. However, Constitution has not indicated that it intends to adopt any site-specific mitigation measures.

CO41-44

We recommended in section 4.1.3.4 of the EIS that Constitution adopt the recommendations and mitigation measures for steep slope and karst areas provided in the Geological Reconnaissance Memorandum dated October 4, 2013. This memorandum includes additional field visits and reconnaissance that would be performed by qualified geologists and engineers to aid in identifying landslide hazards. See the response to comment LA10-1.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-477

CO41-44 cont'd	These and other mitigation measures identified by FERC should be required as conditions of FERC's approval of the Project.
CO41-45	b. Clearing vegetation from steep slopes will increase the likelihood of sediment-laden runoff reaching downslope water resources. Vegetation cover on slopes is the only feature that provides stability to slopes and intercepts rainfall. With it removed or maintained as herbaceous within ROWs, the ability for the existing soils to resist accelerated erosion becomes diminished. Accelerated erosion will lead to sediment impacts in nearby streams and wetlands. Two steep slope areas were directly related to stream crossing and were noted as having potential channel migration.
CO41-46	c. Constitution has proposed to utilize 110-foot ROWs in areas of steep slopes (as opposed to 100-foot ROW in other forested areas and 75-foot ROW in wetlands). The difference between the 110-foot ROW and the 100-foot ROW represents 12.2 acres of interior forest. This additional area of disturbance will cause greater water quality impacts resulting mainly from erosion and sedimentation. As discussed above, increase compaction and reduced vegetative cover increase runoff volume and rate creating conditions that accelerate erosion, especially on steep slopes. Within sensitive areas such as steep slopes, construction practices that reduce (rather than widen) proposed ROW widths should be identified and implemented.

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CO41-45 See the response to CO41-43.

CO41-46 As discussed in section 2.3.2.9 of the EIS, Constitution would use the “two-tone” construction method on steep slopes in order to ensure safe working conditions. This method of construction generally requires an expanded construction right-of-way width.

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CO41 – Earthjustice (cont'd)

S-478

CO41-47

4. Karst Features

Constitution's one-page karst Mitigation Plan identifies karst features as prevalent between mileposts 118.3 and 124.2. Potential avoidance of these areas should be considered. Exposing subsurface karst features to disturbed surface conditions could allow sediment and eroded material to enter subsurface water sources. The mitigation plan calls for monitoring of accelerated erosion, certain unidentified stormwater measures, and silt fence near caves and sink holes. Maintaining waterbody features and limiting the removal of riparian vegetation is suggested but not required or quantified. The mitigation plan identifies notification and investigative procedures if karst features are exposed during construction. However, once the Project is approved and construction has commenced, route changes to avoid larger karst features may not be possible. A revised draft EIS should include a greater investigation of currently identified karst terrain and identification of any caves, sinkholes, or other karst features that have the potential to allow surface contaminants and sediment to enter groundwater sources.

CO41-48

5. Stream Crossings

The crossing methods need to be evaluated and documented for each stream crossing. While a dry open cut is more protective than a wet open cut, environmental impacts to the stream or wetland to be crossed and their downstream waterbodies can still occur under many circumstances. Sediment transport downstream can occur in a dry crossing either as construction is taking place or following the completion of the cut across the stream or wetland.

CO41-47

The commentor's statement regarding avoidance of karst features is noted. We have determined that Constitution's adherence to the mitigation measures in the October 4, 2013 Geological Reconnaissance Memorandum would be protective of the resource.

CO41-48

Waterbodies are proposed to be crossed using either dry or trenchless methodologies, which would limit the potential for erosion, sedimentation, or turbidity. See the response to comment FA4-34 and section 4.3.3 of the EIS regarding Constitution's Trenchless Feasibility Study, which can be accessed in full at: http://elibrary.ferc.gov/0/idmws/file_list.asp?document_id=14160901, (see volume II appendix N). Constitution evaluated trenchless crossings based on a number of criteria such as sensitivity/high quality of habitats and landslide areas. Given workspace requirements, geotechnical conditions, constraints, and overall construction feasibility, we conclude that it is not feasible or practicable to use trenchless methods (conventional bore, HDD, and direct pipe) at every waterbody. Proposed site-specific waterbody crossing methods and information are provided in appendix K of the EIS.

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CO41 – Earthjustice (cont'd)

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CO41-48
cont'd

Destabilization of streambank and streambed due to excavation can increase the likelihood of sediment transport within the stream. The construction activities disturbing the streambed bottom can increase the likelihood of scour, which can eventually damage the gas pipe. The only way to avoid impacts to the streambed, sideslopes, and downstream ecology is to not disturb the surface of the stream with a trench cut for the pipeline. Alternative trenchless technologies allow for a crossing that does not disturb the surface of the streambed or its side slopes. This eliminates changes to the interface between the stream substrate and its flow of water. During construction, there is also the potential for unexpectedly large flows to enter bypass structures such as flumes or pumps. Unless these measures are sized for the largest possible flows, the potential exists for streamflows to enter the trench cut and move sediment downstream.

- a. An individual feasibility study was not performed at each crossing. Many intermediate streams fit into width categories appropriate for conventional bore but were only proposed to be crossed by open cut crossing. If a conventional boring is feasible from a geotechnical standpoint, it should be considered as the preferred stream crossing method.
- b. Crossing multiple adjacent streams at once with a trenchless technology could prevent a cumulative impact. While these streams or adjacent wetlands may not be feasible on an individual basis, the adjacent nature of features that could be avoided by use of trenchless technology could make

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CO41 – Earthjustice (cont’d)

S-480

CO41-48 cont'd	<p>the extra effort worthwhile if in-stream disturbance was avoided. An evaluation of this type has not been performed, but should be considered.</p> <p>c. Only where road crossing were adjacent to streams or wetlands or where the crossing was too large were trenchless technologies proposed. This implies that road disturbance (and the cost of road disturbance and/or restoration) is of higher priority than stream disturbance. More weight should be given to avoidance of high value streams or wetlands that can be crossed by borings and trenchless techniques without surface excavation. While Constitution proposes to avoid impacts by attempting all crossings as dry crossing, disturbance will take place at the surface and sediment transport downstream will become more likely. High value streams and wetlands will be more sensitive to minor sediment impacts and should be considered for trenchless crossing.</p>
CO41-49	<p>d. As proposed, the pipeline would cross Exceptional Value wetlands in Pennsylvania between mileposts 22.5 and 22.7. An alternative crossing method should be evaluated to limit the impact on these wetlands. Wetlands adjacent to streams should also be identified so that a cumulative impact can be avoided if possible.</p>

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CO41-49

Constitution provided an assessment of the potential to use trenchless crossing methods for high quality waterbodies, wetlands, and other features in their trenchless feasibility study (Volume II, Appendix N of their November 2013 filing). The exceptional value wetlands in the area between MP 22.5 and 22.7 encompass 0.38 acre, which is below the 0.5 acre threshold for assessment used in the analyses. Roaring Run Creek, a coldwater fishery near and/or adjacent to the exceptional value wetlands is 22 feet wide, which is below the 30-foot-wide threshold for assessment used in the analyses. We conclude that a trenchless crossing is not warranted in this area for these reasons.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

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CO41-50	<p>6. Temporary Workspaces</p> <p>Temporary workspaces make up a large portion of the disturbance of the pipeline construction. Effort should be made to reduce the need for temporary workspace and minimize the width of disturbance where possible. 75.5 acres of a total of 91.8 acres of wetland impacts are caused by construction activities in temporary workspaces. The need for these disturbances should be evaluated on a site-specific basis. Construction impacts to wetlands can occur when the soils and vegetation are disturbed by heavy machinery used to excavate trenches and move sections of pipe into place. Surface and subsurface flow patterns can become altered by construction disturbances that alter soils and vegetation by altering how water moves from below ground to above or vice versa. The movement of water within a wetland is critical to the type of habitat that is present and any alteration of topography by changing soil elevations or grade can alter water elevations negatively. Clearing of wetland vegetation can limit a wetland’s ability to mitigate flood flows and control localized erosion. Wetland vegetation can play an important role in trapping and accumulating sediment. Vegetation and flow patterns are the primary ways wetlands trap sediment from surface waters. This benefit to local ecology can be disturbed by altering a wetland’s vegetative or hydraulic patterns. Compaction and rutting of wetland soils can alter hydrologic patterns as well as inhibit plant germination.</p>
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CO41-50

See the response to comment CO41-14. As provided in table 4.4.3-1 of the EIS, 91.8 acres of wetlands would be impacted by construction of the proposed pipeline. The majority of the project’s wetland impacts would occur within the construction right-of-way and associated temporary workspaces (75.7 acres) as footnoted in table 4.4.3-1 of the EIS. We have reviewed the locations where Constitution has proposed temporary extra workspaces within wetlands, and found them justified. Our Procedures require Constitution to reduce the right-of-way to 75 feet wide within wetlands.

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CO41 – Earthjustice (cont’d)

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CO41-51

7. Shallow Bedrock

The length of pipeline proposed in shallow bedrock is quite large (45.5 miles). Although Constitution says they have not needed to blast in similar locations, the fact that it is not certain prior to the draft EIS is troubling. If blasting is required, subsequent environmental analyses should be required, including development of a supporting plan to mitigate blasting impacts. The requirements for subsequent analyses and planning should be documented in the Draft Environmental Impact Statement.

RECOMMENDATIONS

CO41-52

The following data collection, data analysis, and construction mitigation measures are recommended for consideration in the Draft Environmental Impact Statement:

- **Baseline Monitoring of Soil Conditions:** baseline monitoring should be required for all soils, not just agricultural and residential soils.
- **Comprehensive impact analysis of sensitive features and areas:** Indexes mapping should be conducted for areas with multiple sensitive features (i.e., highly erodible soils, steep slopes, proximity to wetlands and streams, etc.). By assigning a numerical value for the presence of sensitive features (e.g. one point for each sensitive feature present at a given location), highly susceptible areas can readily be identified, and appropriate alternatives considered and recommendations developed.
- **Cumulative Impact Analyses:** In conjunction with a comprehensive analysis, a cumulative impact analysis should be conducted to identify the number of stream

CO41-51

As discussed in section 4.6.1.4 of the EIS, Constitution stated in its general blasting plan that “Blasting in or near environmentally sensitive areas, such as streams and wildlife areas or cultural resource sensitive areas, may include additional restrictions, which will be included in the site-specific Blasting Specification Plans.” As we recommended in section 4.6.2.3 of the EIS, Constitution would be required to develop site-specific blasting plans in coordination with the state resource agencies to protect fisheries and aquatic resources from the potential effects of blasting in waterbodies.

CO41-52

The commentator’s statements regarding baseline monitoring of soils, index mapping, and cumulative impacts on stream crossings are noted. The FERC Plan, which has been adopted by Constitution, includes special provisions for soils including segregation of topsoil in agricultural and residential areas, and in other locations as requested by the landowner. Sensitive resources are identified within the main body and in the appendices of the EIS. Cumulative impacts are discussed in section 4.13 of the EIS.

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CO41-52
cont'd

crossings per tributary, sub-watershed, and larger stream segments. The number of stream crossings per upstream drainage area should be developed as a me

- **Narrower ROW.**

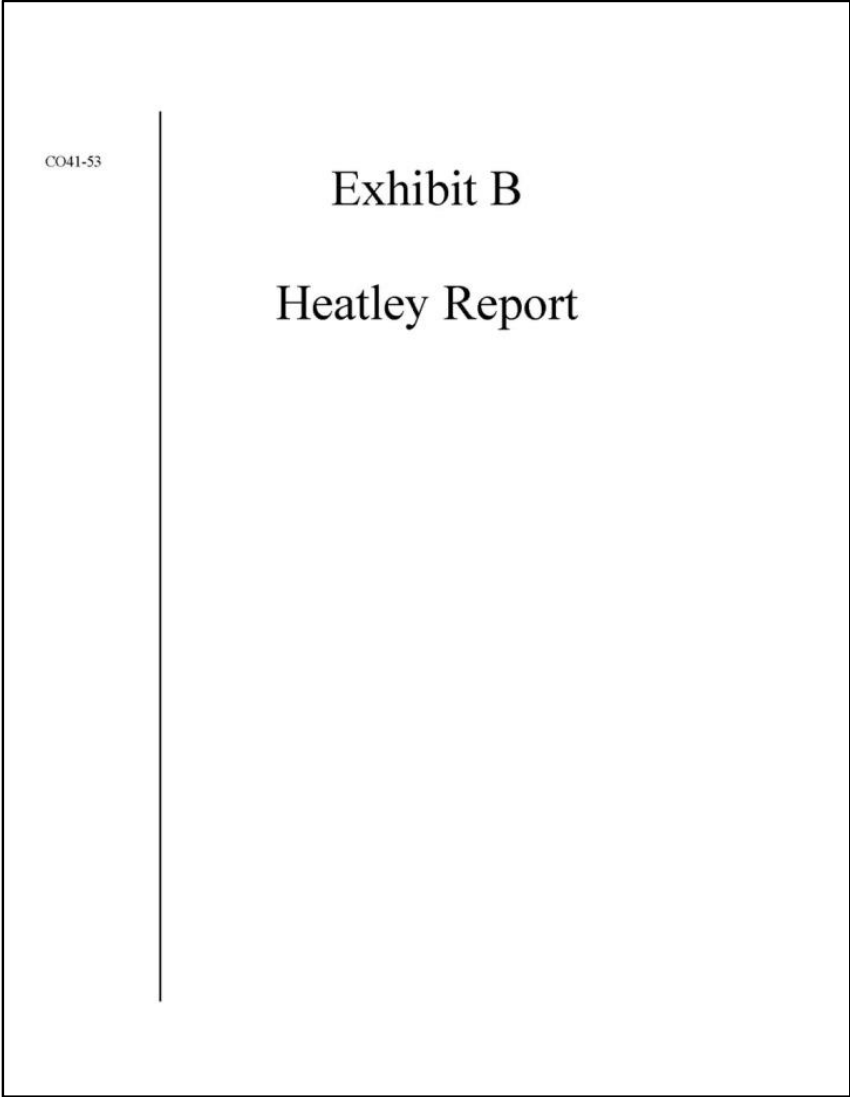
CONCLUSION

Based on all the documents reviewed, FERC has identified many of the impacts likely to occur during construction of the pipeline and the continued maintenance of the permanent ROW by Constitution. These impacts can be mitigated with existing technologies but the proposed construction practices and technologies are not the most advanced nor the most effective in preventing accelerated erosion and sediment transport from uplands into nearby streams and wetlands. When considering the number of stream and wetland crossings by both access roads, construction areas, and the pipeline itself, more care should be taken at each of these impacts to minimize permanent disturbance on a site by site basis. A more thorough evaluation of the cumulative impacts of the varying topography, soil characteristics, stream locations, and sensitive resources needs to be completed so that FERC and other agencies can fully evaluate the entirety of the impacts this pipeline construction will have on soil and water quality in both Pennsylvania and New York.

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CO41 – Earthjustice (cont’d)

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CO41-53 The commentor’s statements regarding the draft EIS are noted. Section 4.5 of the EIS has been updated to include additional information provided by Constitution regarding interior forests and also in regards to invasive species.

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CO41 – Earthjustice (cont’d)

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CO41-53
cont'd

Professional Review & Comment

on

Draft Environmental Impact Statement for

Constitution Pipeline Project (February 2014),

FERC Docket No. CP13-499-000

April 7, 2014

Prepared for:

Earthjustice

Prepared by:

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Restoration Ecologist

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CO41-53
cont'd

EXECUTIVE SUMMARY

This review of the Draft Environmental Impact Statement (Draft EIS) for the proposed Constitution Pipeline project along with the environmental submittals and documentation provided to the Federal Energy Regulatory Commission (FERC) by the Constitution Pipeline Company, LLC (Constitution) was prepared in response to a request by Earthjustice to provide expert opinion on issues of terrestrial and restoration ecology. The construction and maintenance of the proposed 124-mile linear infrastructure will have significant, long term impacts upon the ecological systems both within, and adjacent to, the proposed right-of-way. Avoidance, minimization, or mitigation of land disturbance impacts, such as those associated with the conversion of forested systems to non-forest systems, is critical to ecological sustainability.

Materials reviewed include:

- 1) FERC’s Draft Environmental Impact Statement for the Constitution Pipeline and Wright Interconnect Projects, February 2014
- 2) Constitution’s Environmental Construction Plan, Construction Activities in New York, November 2013 (Environmental Report, Vol. II, Appx. J)
- 3) Constitution’s New York Invasive Species Management Plan, November 2013 (Environmental Report, Vol. II, Appx. J, Attachment 11)
- 4) Constitution’s Soil Erosion & Sediment Control Narrative & Environmental Construction Plan, Construction Activities in Pennsylvania, November 2013 (Environmental Report, Vol. II, Appx. I)

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

CO41-53
cont’d

5) Constitution’s Pennsylvania Invasive Species Management Plan, November 2013
(Environmental Report, Vol. II, Appx. I, Attachment 11)

These materials identify many of the well-documented negative ecological consequences of forest fragmentation, edge habitat creation, and invasive species proliferation, but the mitigation measures proposed fail to fully account for, and address, the impacts that the construction and maintenance of this infrastructure will have with respect to these ecological disruptions.

In particular, the mitigation measures proposed fail to:

- Properly account for the geographic extent and temporal frame of forest edge impacts;
- Fully quantify and mitigate against the loss of interior forest habitat and associated structural and functional values ;
- Recognize the landscape-level dynamics and mitigate against the ecological cascades associated with invasive species and biological invasion;
- Address forest restoration in the significant areas to be deforested as a result of temporary workspace creation;
- Account for the full cumulative impacts associated with the development of this linear corridor.

The landscape-level changes associated with the construction of this corridor are likely to result in an undesirable diminution of the ecosystem benefits and services currently

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CO41 – Earthjustice (cont’d)

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CO41-53 cont'd	<p>provided by the biotic communities along this route. Cascading ecological effects are probable and will require costly management interventions of significant spatial and temporal scale in order to achieve system restoration.</p> <p>Given the failure of the FERC Draft EIS to properly analyze and address the full cumulative impacts of the proposed pipeline, in particular with respect to forest resources and subsequent watershed integrity, a revised draft should be developed and resubmitted for public comment. Should the proposed pipeline project proceed as currently described in the Draft EIS, significant long term negative changes in ecological integrity along the right-of-way corridor are probable.</p>
CO41-54	<p>DISCUSSION</p> <p>A careful review and analysis of the Draft EIS and the materials submitted by Constitution reveals a number of areas of concern with respect to the maintenance of the ecological integrity of terrestrial ecosystems and the corresponding impacts upon aquatic resources. In particular, these plans do not adequately provide for the protection and sustainable regeneration of forest systems along the proposed pipeline route. The canopy cover provided by the forested lands through which the proposed pipeline would cut is of extreme importance to both the quality and quantity of water that flows within the regional drainages.</p>

CO41-54

See the responses to comments FA4-29 (direct and indirect forest impacts, including fragmentation, and mitigation) and CO1-4 (stormwater runoff). The comments regarding the beneficial effects of forests are noted. See the responses to comments FA4-9 and FA6-10 regarding invasive species, particularly in relation to interior forests. The comment regarding changes in stream chemistry following tree clearing is noted (Wang, et al. 2005) and we have updated the EIS to include this information. Although stream chemistry changes are possible following clearing, we expect that these stream-specific impacts would be diminished somewhat with a linear project, with areal impacts spread over larger areas and numerous streams and sub-watersheds, as opposed to large-scale timbering occurring in one location potentially affecting one or a small number of streams.

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cont'd

Background

Forests filter contaminants, moderate stream temperatures and buffer flow volumes associated with precipitation events. They are the structural foundation upon which the ecological integrity and health of this region’s biological resources are built. The link between percent forest cover and water quality is clearly established in the scientific literature. As an example, reductions in forest cover are directly correlated with negative changes in water chemistry, such as increases in nitrogen, phosphorus, sodium, chlorides, and sulfates, and with reductions in stream macroinvertebrate diversity (Jackson and Sweeny 2010).

Forest fragmentation as a result of anthropogenic landscape modification is well recognized within biogeographic theory and conservation biology as a leading cause of local species extinctions (extirpation). It can also cause dramatic shifts in the floral and faunal composition of woodland communities. Sub-lethal impacts to floral and faunal populations (population isolation, reduced genetic fitness and diversity) have also been associated with disruptions to forest connectivity (Clark, et al. 2010). Recent modeling work performed by the Pennsylvania Chapter of The Nature Conservancy indicates that approximately two thirds of the Marcellus well pads to be built in Pennsylvania will be located in what is currently forested habitat (TNC 2010). The USGS has also documented a disproportionate level of interior forest loss (two to three times greater than overall forest loss) over the last several years from natural gas infrastructure construction in areas such as Susquehanna County, PA (Slonecker 2013). Pipeline collection and transmission corridors have proven to be the primary contributing factor in the loss of interior forest.

COMPANIES AND ORGANIZATIONS

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CO41-54 cont'd	<p>Fragmentation creates an increase in the amount of forest edge (the interface between forest and non-forest). This transitional zone or “ecotone” is fundamentally different in structure and functionality from an interior forest system. Edge habitat is characterized by increased light levels on the forest floor, reduced soil moisture, and a high degree of biological invasion from non-native invasive organisms. Dramatic changes can occur in the soil chemistry and associated micro biota. The top layer of the soil profile, the rich organic duff, begins to dry out and the primary decomposition community begins to shift from fungal to bacterial. Typically extending up to 300 feet into the forest, edge impacts are more than mere esoteric considerations of interest to the scientific community; these changes have direct economic implications to both landowners and society. Invasive species, for instance, have been estimated to cost the U.S. economy approximately \$120 billion dollars per year (Pimintel et al. 2004).</p> <p>Invasive organisms within terrestrial forest environments tend to be early successional species that respond favorably to site disturbance. Disruption of native plant cover and the exposure of the forest floor to sunlight provide an opportunity for these organisms to establish satellite populations. These populations eventually radiate out into the adjacent forest, displacing native species and retarding desirable tree regeneration (Bennet et al. 2011). Dispersal (vectoring) mechanisms and/or corridors are required in order for these non-native species to colonize new locations and the access roads, pipelines, and vehicular traffic associated with natural gas extraction is ideally configured to serve this function. Far beyond the point where wells are decommissioned, the landscape legacy of forest edge from pipeline corridors, access roads and well pads will continue to disrupt ecosystem</p>
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CO41 – Earthjustice (cont’d)

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CO41-54 cont'd	<p>functioning as non-native organisms repeatedly colonize exposed areas and impede desirable tree regeneration.</p> <p>Invasive species suppression and the eventual restoration of these disturbed sites to forested systems will require resources of a significant financial and temporal scale. While published information is scarce, it is in the professional experience of restoration practitioners in this region that the reasonable reconstruction of forest canopy and understory diversity can cost between \$4,000 and \$10,000 per acre. The suppression of invasive plant species is also a major, recurring expense with the initial years' treatment often costing between \$1,000 and \$2,500 per acre. Invasive treatment in subsequent years typically drops in cost by approximately 50% per year over the first three years.</p> <p>As the effects of forest fragmentation may not immediately manifest themselves following the disturbance, monitoring is often suggested as a methodology to balance and modify the level of fragmenting activity in accordance with the conservation of forest-related ecosystem services. Unfortunately, these effects may not be linear in nature and thus are not always amendable to an adaptive management approach. Biological systems may possess thresholds that provide little indication of impending adverse impacts until sudden system collapse.</p> <p>It is from within this conceptual framework that a review of the Constitution Pipeline submissions was undertaken and the following concerns identified.</p>
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COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-492

CO41-54
cont'd

Shortcomings in the Draft EIS

VEGETATION

- Section 4.5.1 – Existing Vegetation Conditions

FERC correctly identifies that the majority vegetation cover type to be impacted by the pipeline project and associate workspaces will be upland forest. However, it grossly underestimates the area of impact as it arbitrarily assumes the “impact” to be restricted to the area where soil is moved or vegetation cleared (983 acres). This completely disregards the science of conservation biology with respect to forest fragmentation and edge impacts. At a minimum, where infrastructure traverses or disrupts forest cover, the impact area should include a zone extending 300 feet into the adjacent forest. FERC already recognizes this impact zone in its definition of interior forest (Draft EIS at 4-70). It is logically inconsistent to fail to include this area when calculating areas of impact.

In order to properly determine the area of forest impact, FERC must conduct a spatial analysis whereby the vegetative cover zones along each segment of the proposed pipeline route would be examined and the size of the forest polygons that the route crosses calculated—not just the area of forest cleared during construction.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

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CO41-55	<ul style="list-style-type: none">• Section 4.5.2 – Vegetation Communities of Special Concern or Value <p>FERC makes the claim that a 9% reduction in the width of the construction right-of-way within two areas containing NYSDEC significant natural communities (a Limestone Wooded Community and a Calcareous Talus Slope Woodland – both in Schoharie County, NY) will “...<i>minimize impacts on these areas to the extent practicable.</i>” As the construction right-of-way will still be 100 feet across, there is a reasonable probability from an ecological standpoint that the increased light penetration and soil moisture changes associated with this newly created forest edge will result in changes to the vegetative community. FERC has offered no scientific justification for concluding that the 9% reduction will have any substantive positive impact.</p>
CO41-56	<ul style="list-style-type: none">• Section 4.5.3 – Interior Forest Habitat <p>FERC correctly adopts the definition of interior forests as “...<i>forested areas greater than 300 feet from the influence of forest edges or open habitat.</i>” This indicates that FERC does indeed recognize and acknowledge the science behind edge impacts and their effect on forest systems. Yet FERC, within the Draft EIS, repeatedly grossly underestimates the acreage of forest disturbance by refusing to account for the adjacent edge-impacted forest areas. For example, FERC repeats Constitution’s claim that the Project only will permanently eliminate 217.9 acres of interior forest.</p>

CO41-55

As stated in section 4.5.2 of the EIS, these natural communities are not protected by any state or federal regulations. The proposed pipeline would cross 0.6 mile of these communities. A 110 foot right-of-way would impact 8 acres while a 100 foot right-of-way would impact 7.27 acres of these communities. We agree that the cutting of trees would increase the amount of light reaching the ground and likely alter soil moisture levels, at least until vegetation becomes re-established. However, as noted above, this impact would be reduced by the restricted right-of-way width and restoration (including seeding) immediately following construction. See also the response to comment CO13-1.

CO41-56

See the responses to comment FA4-29 (see revised EIS text for direct and indirect forest impacts, including fragmentation, and mitigation). The EIS discusses impacts upon wildlife, including avian species and other non-avian species, in Section 4.5.3.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

CO41-56
cont'd

FERC repeats Constitution’s misleading estimate of interior forest disturbance: “*Constitution would bisect 129 interior forest blocks greater than 35 acres, creating 55 forested blocks less than 35 acres in size.*” This information is of little value in understanding the level of interior forest loss that will occur should the project be built. The number of interior forest blocks is not the issue, the total acreage of interior forest lost both to clearing and the 300-foot penetration of edge effects is the metric of concern. FERC should require the complete disclosure of, and a comparative analysis demonstrating, the total acreage change in interior forest habitat that is being proposed. This analysis should include full spatial data detailing the extent of interior forest resources along the entire proposed pipeline route, along with connecting forest and riparian corridors. Once the full scope of impacts to interior forests is determined, FERC should also require the preparation of a complete analysis of the disruption in forest connectivity and landscape-level wildlife corridors that will occur and of any avoidance, minimization, or mitigation measures available.

In addition, FERC has based its analysis of interior forest value solely upon avian species and has neglected to discuss the documented changes in vegetation and soil dynamics associated with forest edge creation. Loss of interior forest will impact populations of terrestrial organisms such as certain amphibians which can be effectively isolated, and cut off from, historic breeding locations by linear infrastructure.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont'd)

S-495

CO41-57

- **Section 4.5.4 – Noxious Weeds and Other Invasive Plant Species**

FERC erroneously states that Constitution will be “...*discharging hydrostatic test waters within the source watershed*”. What Constitution actually states is, “*Once the testing is completed, the hydrostatic test water will be returned to the same watershed(s) from which they were collected, where possible*”. (Constitution’s New York Invasive Species Management Plan, section 3.3.1).

The use of untreated surface water in massive quantities for hydrostatic testing (16,592,520 gallons estimated for the New York section of the pipeline) creates a large risk of vectoring invasive species. It is unrealistic that these volumes of water could be discharged onto the ground and, given the topography of the region, not have overland transport into drainage pathways. The unintentional introduction of an invasive organism (such as *Didymosphenia geminata* or “rock snot”) from one subwatershed into another could have devastating long term economic and ecological consequences. As an example, non-indigenous species that have been introduced to the New York State Canal and Hudson River system have caused estimated annual losses of \$500, the majority of which involved harm to commercial and sport fishing industries.

CO41-58

FERC also is not accounting for latent seed back germination or for the long term vectoring of invasive species that will occur throughout the service life of the right-of-way due to forest fragmentation and edge creation. As such,

CO41-57

We issued an environmental information request to Constitution on August 29, 2013, requesting clarification on whether discharged hydrostatic test water would be transferred between watersheds. In response, Constitution provided a revised Resource Report 2 in November 2013. Section 2.2.5 of Constitution’s Resource Report 2 states, “The discharge locations have not been identified, but all discharge locations will be sited within a well vegetated upland area within the same watershed. No inter-basin transfers are expected to occur as a result of the hydrostatic testing.” (http://elibrary.ferc.gov/0/idmws/file_list.asp?document_id=14160901). Constitution would use a dewatering device consisting of geotextile fabric and hay bales for discharge of hydrostatic test water. Although not designed for this purpose, the dewatering structure could serve a dual purpose by filtering invasive species fragments from the test water.

CO41-58

See the responses to comments FA4-9 and FA6-10 regarding invasive species, particularly in relation to interior forests.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

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CO41-58 conf'd	<p>the conclusion that “...the potential spread of noxious or invasive weeds would be effectively minimized or mitigated” is unsupportable.</p>
CO41-59	<p>WILDLIFE AND AQUATIC RESOURCES</p> <ul style="list-style-type: none">Section 4.6.1.3 – Migratory Birds <p>FERC correctly recognizes that the fragmentation of large forested tracts during construction and operation of the project could create long-term impacts on Birds of Conservation Concern, yet the only specific recommendation offered to reduce these chronic impacts to interior forest bird species is a minor reduction of the right-of-way width, where possible, by 9%. As stated previously, there is no scientific justification to demonstrate that this will have any significant, measurable impact on reducing the level of habitat loss.</p> <p>The loss of interior forest habitat will permanently remove suitable breeding habitat from these species as there is no forest restoration plan included in the FERC analysis. Additional disruption of nesting success from brown-headed cowbird parasitism is likely due to the proliferation of forest edge and the corresponding diminution of interior forest. Without a cumulative analysis of the total interior forest acreage lost, the Draft EIS cannot properly assess the impact to migratory wildlife.</p>

CO41-59

See the responses to comments CO13-1 and CO26-14. The ecological value of forest interior to migratory birds and other species, the time required to produce mature forests relative to edge or grassy habitats, and the generally common nature of early successional or grassy habitats are acknowledged. The EIS has been edited to clarify these points. The EIS acknowledged impacts on interior forest dwelling species such as migratory birds (sections 4.5.3 and 4.6.1.3) and that the establishment of new corridors could result in issues such as increased predation (section 4.6.1.3) and spread of invasive species (section 4.5.4). The statement in the EIS that the new edge habitat providing habitat to some wildlife species is correct, and not meant to diminish the impacts on species that require large unfragmented forests.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

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CO41-59 cont'd	<ul style="list-style-type: none">• Section 4.6.1.3 – Migratory Birds Misleading statements are made with respect to the value of early successional habitat. For example, <i>"the creation of additional edge habitat could benefit certain species by providing travel corridors and additional forage habitat"</i>. This conveniently ignores the declining levels of interior forest habitat and the corresponding explosion of edge conditions across the eastern United States. Edge is ubiquitous and can be created overnight. Interior forest requires decades of accrued equity in tree growth. To equate the two is highly simplistic and misleading. Missing is a discussion of the threat that these corridors pose with respect to vectoring corridors for biological invasion and the ubiquitous nature of edge habitat across the eastern United States.
CO41-60	<ul style="list-style-type: none">• Section 4.6.1.5 – Conclusion (Wildlife and Aquatic Resources) FERC states that <i>"Overall, wildlife resources are not expected to be significantly impacted due to construction and operation of the projects based on the amount of similar adjacent habitat available for use, the proposed clearing window for avoidance of the migratory bird nesting season, and our recommendation to develop an Upland Forest Mitigation Plan, which would further minimize impacts on wildlife due to forest clearing."</i> This statement is wholly unsupportable as FERC has not properly estimated the level of lost interior forest, nor has it addressed the chronic impacts associated with the creation of forest edge for the entire service life of the right-of-way. Neither

CO41-60

The commentator’s statements are noted. However, the statement referenced is regarding the overall proposal rather than limited to just wildlife in the area of interior forests. Further, our upland forest mitigation plan recommendation states that the company should consult, mitigate, and justify its actions.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-498

CO41-60 cont'd	<p>FERC nor Constitution has produced any spatial or population data to justify the contention that there is adequate adjacent habitat to support specific wildlife species likely to be impacted by the project. As the recommended Upland Forest Mitigation Plan has neither been written nor reviewed, it is also premature to utilize it as further justification for the conclusion that wildlife impacts will be minimized.</p>
CO41-61	<ul style="list-style-type: none"> Section 4.7.3 – State Listed Species <p>With respect to the small-footed bat, the northern myotis, and the silver-haired bat, FERC reaches the conclusion that the project would not result in adverse impacts on these sensitive species. However, FERC utilizes the Upland Forest Mitigation Plan recommendation, a plan that has neither been written nor reviewed yet, as part of the justification for this conclusion. This is premature.</p>
CO41-62	<p>FERC comes to a similar premature conclusion with respect to the Timber Rattlesnake, listed as threatened in New York. The Commission points to unwritten and unspecified “mitigation measures” as justification for a population level conclusion on the viability of a sensitive species.</p>
CO41-63	<ul style="list-style-type: none"> Section 4.13 and 5.1.13 – Cumulative Impacts <p>FERC reaches the unsubstantiated conclusion that the cumulative impacts associated with Marcellus Shale development and the proposed project</p>

CO41-61	<p>Our conclusions of impacts on the small-footed bat, the northern long-eared bat, and the silver-haired bat were based on many factors, including the Upland Forest Mitigation Plan, but even more so on section 4.7.3 of the EIS, where we recommend that prior to construction, Constitution should develop impact avoidance, minimization or mitigation measures in coordination with the FWS and the PGC for construction between April 1 and October 31 to minimize impacts on these species. Constitution would file any such measures with the Secretary.</p>
CO41-62	<p>In section 4.7.3 of the EIS, we recommend that prior to construction, Constitution should file with the Secretary the results of any outstanding surveys for New York and Pennsylvania state-listed species and identify additional mitigation measures developed in consultation with the applicable state agencies. These surveys would accurately depict the level of impact with no mitigation; however, as our recommendation also requires consultation to develop mitigation, impacts would be reduced. Further, the likelihood that this project alone would cause the species to be federally listed is improbable.</p>
CO41-63	<p>The commentator’s statement regarding the adequacy of the PADEP and the Susquehanna River Basin Commission’s regulations is noted.</p>

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

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CO41-63 cont'd	would not contribute in any significant way to adverse effects on water resources. To justify this conclusion, FERC defers to the regulations and associated Best Management Practices of both the Pennsylvania Department of Environmental Protection and the Susquehanna River Basin Commission. However, this presupposes that the regulations promulgated by these two agencies are, in themselves, adequate.
CO41-64	FERC fails to include any analysis of the landscape-level disruption to watershed hydrology that occurs when vegetative cover types are changed.
CO41-65	<p>FERC also fails to present any spatial analysis of the cumulative impacts to interior forest resources associated with forest fragmentation and forest edge creation. Interior forest functioning is predicated upon the spatial orientation and configuration of each forest block in relation to adjacent forests and other land cover types. Disruption of connective corridors, edge effects penetration, and a reduction in edge complexity (strait, linear edge as opposed to sinuous, gradual edge) will have ecological consequences that cannot be understood with a quantification of these disruptions.</p> <p>FERC has failed to provide any plan for the restoration of forest resources associated with this proposed project. While FERC recognizes that, “The greatest impact on vegetation would be on forested areas because of the time required for tree regrowth back to pre-construction condition,” it ignores the</p>

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CO41-64	As discussed in section 4.13.6.3 of the EIS, while the vegetation impacts in the area of the proposed projects would not be inconsequential, the overall impact in the project area would be considered minor in comparison to the abundance of comparable habitats in the broader area and given implementation of Constitution’s Preliminary Migratory Bird and Upland Forest Plan. The Applicants also would be required to restore vegetation in temporarily disturbed areas, and non-jurisdictional project-related facilities would likely be held to similar standards by state permitting agencies. As discussed previously, due to aesthetic reasons it is unlikely that any residential area would be left unrestored following construction. Disruption to watershed hydrology is not expected.
CO41-65	We have updated section 4.13.6.3 regarding cumulative impacts on forest resources in general and for FERC-regulated projects in particular. Impacts and mitigation for forested lands are discussed in sections 4.5.5, 4.8.6, and 4.13.6.5 of the EIS. In general, Constitution would be required to ensure that the disturbed right-of-way is stabilized with herbaceous species and invasive species are controlled, and then trees would be allowed to re-grow in the former temporary workspaces. In accordance with our Procedures section V.D.1, Constitution would limit vegetation maintenance in riparian zones to promote eventual shading of adjacent streams. Our experience is that with suitable growing conditions, re-growth of trees is not delayed for decades by undesirable or early successional species. See the response to comment CO41-54.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-500

CO41-65
cont'd

need to manage the reforestation effort and assumes natural regeneration will return the system to “pre-construction condition.” This statement is unjustified as FERC is assuming the forest trajectory will follow historic patterns of regeneration. As riparian tree cover will not be allowed within the majority of the permanent right-of-way (within 15 feet of either side of the pipeline in wetland environments), stream shading will be reduced permanently, not “temporarily,” as claimed in this section. Loss of tree cover can lead to elevated water temperatures, reduced dissolved oxygen levels and, ultimately, to reduced fish survival and fitness. Without a planting and/or restoration plan, and given the permanent linear edge created along the maintained right-of-way, reforestation of temporary workspace is likely to be delayed for decades as undesirable, early successional vegetation becomes established in the disturbed areas. Planning and management will be required to assure full restoration of the original forest structure and function.

CO41-66

With respect to fisheries, FERC’s analysis is limited to individual waterbody crossings and disturbances and fails to address the likely changes in subwatershed water quality and flow quantity associated with vegetative cover changes.

CO41-66

See the response to comment CO41-64.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-501

CO41-67	<p>Environmental Construction Plan – Construction Activities in New York¹</p> <p>While the Environmental Construction Plan for New York (“ECP-NY”) primarily focuses upon sedimentation and erosion control in relation to surface water quality, it fails to detail or account for changes in vegetative cover type that will disrupt both surface and subsurface hydrologic regimes. Conversion of cover type from forested to non-forested will impact both groundwater recharge and surface run-off coefficients within ecological planning units such as the subwatershed. Forested land has a greater capacity for the interception and retention of precipitation than either grassland or developed soils. A conversion and dispersed disruption of this cover type will result in reduced groundwater recharge, heavier plug flows in streams during storm events, and reduced base flows of streams during dry periods.</p> <p>The ECP-NY misleadingly states that, “<i>The existing [rights-of-way] provide corridors that will be utilized by several species to move between habitats.</i>” However, the ECP-NY fails to identify the corresponding suite of interior species that are effectively blocked from movement across these same corridors. Edge habitat, along with the generalist species that are listed in this section as utilizing these right-of-way corridors, is ubiquitous across the eastern United States. The interior forest habitat disrupted by these corridors is a rapidly diminishing resource. In addition to providing habitat for a range of species intolerant of edge conditions, interior forests are structurally and functionally different from edge systems. It is important not to equate the two. For instance, soil moisture and organic matter levels are typically higher, and forest floor light levels lower, in interior forest. As a</p> <p>¹ Due to the high degree of commonality between the ECP-NY and ECP-PA plans, the concerns detailed here are applicable to both documents.</p>
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CO41-67

The commentor’s statement regarding Constitution’s ECPs are noted.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-502

CO41-67 conf'd	<p>result, the decomposition community is primarily driven by fungal organisms as opposed to bacterial. This has profound implications for both nutrient recycling and plant growth.</p> <p>Interior forests are also critical to watershed integrity as they have higher rates of stormwater retention and filtration. In addition, these systems are important carbon sinks due to their long term stability. Interior forest represents decades of accrued equity in tree growth and cannot be reproduced without a significant time investment.</p>
CO41-68	<ul style="list-style-type: none">• Section 5.3 – Clearing <p>The ECP-NY indicates that trees to be saved will be marked before clearing begins. Unfortunately, no clear tree preservation strategies are provided. Violation of the integrity of the critical root zone (the area around each plant encompassing the majority of the fine, feeder roots) will result in eventual tree loss due to soil compaction. It is vital that, at a minimum, details be provided regarding the methodology for determining both the size of the critical root zone and the protective measures to be employed.</p>• Section 5.3 – Clearing <p>The Draft EIS does not provide any detail with respect to the removal of cleared-tree debris. In order to minimize negative impacts caused by tree clearing, the ECP-NY should prohibit the stockpiling or discharge of woodchips into adjacent woodlands or within the critical root zones of trees targeted for retention.</p>

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CO41-68

It is assumed all trees marked for retention would be left intact. As discussed in section 2.3.1 of the EIS, timber may also be cut and stacked at the edge of the right-of-way in accessible area, if requested by the landowner. Wood chips would not be placed in agricultural areas, wetlands, or waterbodies. Timber would not be left in piles or stacks on the right-of-way. Disposal of wood chips would be in accordance with section IV.F.4 of the FERC Plan.

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CO41 – Earthjustice (cont’d)

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CO41-69	<div><div><div>• Section 5.5.7 – Restoration and Revegetation</div><div>This section confuses “restoration”; a process that reproduces the original structural and functional attributes of the disturbed ecosystem, with “reclamation”; the minimization of erosion and sediment movement. None of the submitted plans addresses “restoration”.</div><div>In order to maximize the opportunities for maintaining ecological relationships, native species should be required as the dominant vegetative cover in plantings conducted outside of developed and agricultural landscapes.</div></div></div>
CO41-70	<div><div><div>Testing for, and mitigation of, soil compaction should not be limited to agricultural areas, particularly with respect to temporary work spaces that, pre-disturbance, contained forest cover. Soil compaction is a major inhibitor of desirable tree regeneration and establishment. Restoration of the forest system and the associated economic value along these temporary work spaces will require protection of soil structure.</div></div></div>
CO41-71	<div><div><div>No allowance has been made for the reforestation of denuded areas of forest within the proposed 50 to 60 feet of temporary workspace that is described in section 4.1.1 (Right-of-Way and Staging Areas). At a minimum, these areas will require either supplemental tree planting or an approved reforestation plan utilizing adjacent seed sources if true restoration is to occur.</div></div></div>

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CO41-69	As stated in section 2.3.1 of the EIS, soils that supported vegetation prior to construction would be revegetated using seed mixes, application rates, and timing windows recommended by local soil conservation authorities or other duly authorized agencies (such as the Natural Resources Conservation Service [NRCS]), landowner requests, and in accordance with the ECPs. Revegetation would not be considered complete until vegetation is similar in density and cover of non-nuisance vegetation to adjacent undisturbed lands.
CO41-70	See the response to comment CO41-10.
CO41-71	See the response to comment CO41-65.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-504

CO41-72

• **Section 4.6.1.3 – Migratory Birds**

Misleading statements are made with respect to the value of early successional habitat. For example, *“the creation of additional edge habitat could benefit certain species by providing travel corridors and additional forage habitat”*. This conveniently ignores the declining levels of interior forest habitat and the corresponding explosion of edge conditions across the eastern United States. Edge is ubiquitous and can be created overnight. Interior forest requires decades of accrued equity in tree growth. To equate the two is highly simplistic and misleading. Missing is a discussion of the threat that these corridors pose with respect to vectoring corridors for biological invasion and the ubiquitous nature of edge habitat across the eastern United States.

CO41-72

See the response to comment CO41-59.

Invasive Species Management Plans²

CO41-73

• **Section 1.0 – Introduction**

The Invasive Species Management Plan (ISMP) states that Constitution’s overall goal is to, *“...control the invasive species to the extent that wetlands and uplands are not dominated by the invasive species to the point where the functions and values of the systems/habitats are adversely compromised”*. However, there are no measurable metrics indicated in the document that would allow for quantitative assessment of progress towards that goal. It is common practice in invasive control contracts for the land management entity to require a certain

CO41-73

See the response to comment CO41-58.

² Due to the high degree of commonality between both the New York and Pennsylvania Invasive Species Management Plans submitted by Constitution Pipeline Company LLC, the concerns and recommendations detailed here apply to both plans.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

S-505

CO41-73
cont'd

percentage of invasive cover reduction be achieved after a given time frame. This provides a clear benchmark whereby project success can be measured. Constitution’s Plan lacks such a requirement.

While the plan identifies the difficulty in achieving eradication of invasive species due to issues such as seed drift and/or colonization from off-site locations, it fails to mention two critical vectoring mechanisms that are of extreme importance when dealing with a right-of-way construction: (1) the latent seed bank residing in the soil, and (2) the chronic encouragement of invasive colonization due to the expansion of edge habitat. Depending upon the species, invasive seeds and propagules can survive in the soil for years. Japanese stiltgrass (*Microstegium vimineum*), for instance, has a seed viability that exceeds seven years. Movement of soil from one section of the project to another can easily disperse these organisms across the entire location.

The nature of edge habitat – disturbed areas of high light penetration, creates ideal conditions for biological invasion. One of the primary transport mechanisms for invasive plants are birds that preferentially roost at the forest edge and subsequently defecate invasive seeds into the understory. It is important to recognize that, until such time that the forest canopy closes over the right-of-way, the edge habitat that has been created will be highly susceptible to invasive colonization. Once established, small populations can

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CO41 – Earthjustice (cont’d)

S-506

CO41-73 cont'd	<p>expand into off-right-of-way properties and disrupt forest regeneration, soil chemistry, habitat, hydrology, and ultimately land value.</p> <p>Recognizing the chronic nature of the biological invasion threat that is promoted by the creation and perpetuation of edge habitat, it is obvious that a treatment timeframe that only lasts for three years is wholly inadequate.</p>
CO41-74	<ul style="list-style-type: none">• Section 2.0 Existing Conditions <p>The ISMP incorrectly characterizes invasive plant species as “<i>nutrient-poor-soil-loving species</i>”. In actuality, invasive plant species are more likely to become established and outcompete native plants in soils that are nitrogen rich.</p> <p>Supplemental fertilization should be avoided in areas where invasive activity is occurring.</p>
CO41-75	<ul style="list-style-type: none">• Section 3.1 – Measures to Prevent or Control the Transport of Invasive Plant Species <p>The ISMP indicates that sediment and erosion control devices will be used to help prevent the dispersal of seeds and root masses from invasive plant species into “...<i>wetlands currently unaffected by invasive species</i>”. As upland systems are also susceptible to biological invasion this strategy should be expanded to protect upland habitats. There is no sound scientific reason to focus only upon wetland protection.</p>

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CO41-74 The commentor’s statement regarding invasive species and fertilizer application is noted. Constitution would follow the recommendations of the local NRCS.

CO41-75 Section 1 of Constitution’s New York Invasive Species Management Plan states “Therefore, Constitution’s overall goal is to control the invasive species to the extent that wetlands *and uplands* (emphasis added by the FERC staff) are not dominated by the invasive species to the point where the functions and values of the systems/habitats are adversely compromised. Constitution’s invasive species plan further states “To prevent the spread of seeds, roots, or other viable plant materials, equipment used in areas containing invasive plant species will be power-washed with clean water (no soaps or chemicals) before moving from an area populated with invasive species.” That requirement would apply regardless of whether the sites were in wetlands or uplands. The statements made by the commentor are regarding elevated wash stations while others areas would have a non-elevated wash station.

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CO41 – Earthjustice (cont’d)

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CO41-75 cont'd	<p>The ISMP states that vehicles, equipment and materials will be cleaned of remnant soils, vegetation, and debris before they are brought to the project area or moved to “...another wetland; within the construction [right-of-way]”. Again, this myopic focus upon protecting wetlands from biological invasion and not uplands has no scientific basis. It is advised that the same strategy be applied to upland areas.</p> <p>The ISMP states that washing of construction vehicles on an elevated wash rack station will occur in sites “only where both” the construction equipment exits near a wetland identified in the ISMP as containing invasives and when the construction equipment is to enter an adjacent upland or another wetland within the next 1,000 linear feet along the construction right-of-way that are free of invasive species. Again, this should occur regardless of whether the system is a wetland or an upland.</p>
CO41-76	<p>The ISMP indicates that, if surface water is used for dust control, the equipment will be disinfected afterwards. While helpful, it would be of much greater value not to broadcast untreated surface water for dust control if there is a threat of invasive propagule contamination. This is a potential vectoring mechanism for invasives if the runoff collects, for instance, in a drainage ditch and ultimately reaches a new water body.</p>

CO41-76	<p>As stated in section 4.3.3.5 of the EIS, Constitution and Iroquois would use intake screens (which would help prevent the spread of invasive species propagules) for water withdrawals and also would use municipal water sources (which should be free of invasive species) for dust control activities.</p>
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CO41 – Earthjustice (cont’d)

S-508

CO41-77	<p>The ISMP clearly states that Constitution “<i>will not</i>” treat areas outside its proposed construction right-of-way for invasive species. This is highly problematic given that the edge habitat created by the Constitution project will encourage biological invasion in the adjacent forest lands for the entire service life of the right-of-way. Suppression costs will eventually fall upon the adjacent property owner should an infestation become established.</p> <p>The ISMP language regarding the movement of soils, gravel, rock and other fill materials infested with invasive plants, “<i>will be avoided</i>” and “<i>to the extent practicable</i>” is grossly inadequate. This language should be changed to “shall be avoided” and to the “maximum extent technically feasible”.</p>
CO41-78	<ul style="list-style-type: none">• Section 3.3.1 – Hydrostatic Pressure Testing <p>The use of untreated surface water in massive quantities (16,592,520 gallons estimated for the New York section of the pipeline) for hydrostatic testing creates a large risk of vectoring invasive species. Untreated surface waters should be treated before release or returned and discharged within the same subwatershed from which they were collected. It is unrealistic to expect to discharge these volumes of water onto the surface and, given the topography of the region, not have overland transport into drainage pathways.</p>

CO41-77	The commentor’s statements regarding invasive species are noted. See the response to comment FA6-10. Constitution would be responsible for the area that it disturbs as part of construction and would not have access to areas outside of its project as would be allowed by the FERC Certificate and landowner easement agreements.
CO41-78	See the response to comment CO41-57.

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CO41 – Earthjustice (cont’d)

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CO41-79	<ul style="list-style-type: none">• Section 3.4 – General Management Activities <p>A three-year monitoring timeframe is inadequate to address latent seedbank germination and chronic edge effects. Invasive monitoring and treatment should constitute a routine maintenance activity for the entire life span of the right-of-way.</p>
CO41-80	<ul style="list-style-type: none">• Section 4.0 – Summary/Conclusions <p>The statement that, “<i>The proposed management activities outlined within this plan will prevent the inadvertent spread of existing populations of invasive plant species and will promote the establishment of native plant populations</i>”, is not accurate. The proposed strategies are not adequate for invasive suppression given the scale and nature of the landscape disturbance that is proposed by Constitution.</p> <p>SUMMARY</p> <p>The documentation and proposed mitigation strategies submitted by Constitution do not provide an adequate assessment of the probable impacts associated with the rapid conversion of forested ecosystems to natural gas pipeline right-of-way. They also fail to recommend potential mitigation strategies and options that would offset and reduce the “significant” impacts anticipated for native terrestrial ecosystems. Protection of these terrestrial ecosystems is critical to the continued health of the regions’ aquatic resources. Inadequate attention has been given to the following vital considerations: forest edge creation, forest fragmentation, interior forest loss, invasive species proliferation, ecological</p>

CO41-79 See the response to comment CO41-58.

CO41-80 The commentor’s statements are noted.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

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restoration of temporary working spaces, and cumulative impacts. In addition, the Draft EIS fails to fully address a range of fundamental impacts associated with the project proposal.

Should the Certificate of Public Convenience and Necessity be issued by FERC without substantial changes to these construction and management plans, widespread disruption of forest ecosystems and local watershed resources will occur. Restoration of these systems following the eventual cessation of natural gas extraction will be a monumental cost incurred by both the taxpaying public and adjacent private property owners.

COMPANIES AND ORGANIZATIONS

CO41 – Earthjustice (cont’d)

CO41-80
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REFERENCES

1. Bennet, A.E., Thomsen, M., Strauss, S. Y. Multiple mechanisms enable invasive species to suppress native species. *American Journal of Botany*, 98:1086-1094. 2011.
2. Clark, R.W., Brown, W.S., Stechert R.S., Zamudio, K.R. Roads, Interrupted Dispersal, and Genetic Diversity in Timber Rattlesnakes. *Conservation Biology*, 24:1059-1069. 2010.
3. Jackson, J.K., Sweeney, B.W. Expert Report on the Relationship Between Land Use and Stream Condition (as Measured by Water Chemistry and Aquatic Macroinvertebrates) in the Delaware River Basin. DRBC Contribution Number 2010011. Stroud Water Research Center, Avondale, PA. 2010.
4. Pimentel, D., Zuniga, R. & Morrison, D. Update on the environmental and economic costs associated with alien-invasive species in the United States. *Ecological Economics* 52, 273-288 (2004).
5. Slonecker, E.T., Milheim, L.E., Roig-Silva, C.M., and Malizia, A.R., 2013, Landscape Consequences of Natural Gas Extraction in Allegheny and Susquehanna Counties, Pennsylvania, 2004–2010, U.S. Geological Survey Open-File Report 2013–1025, <http://pubs.usgs.gov/of/2013/1025>.
6. The Nature Conservancy. 2010. Pennsylvania Energy Impacts Assessment http://www.nature.org/media/pa/pa_energy_assessment_report.pdf.